

THE
WORLD displayed;
OR, A
CURIOUS COLLECTION
OF
VOYAGES and TRAVELS,

Selected from
The WRITERS of all NATIONS.
In which the
CONJECTURES and INTERPOLATIONS
OF

Several vain *Editors* and *Translators* are
expunged,

Every Relation is made concise and plain,

AND

The DIVISIONS of *Countries* and *Kingdoms* are
clearly and distinctly noted.

Illustrated and Embellished

With Variety of MAPS and PRINTS
By the best HANDS.

V O L. XX.

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Printed for J. NEWBERRY, at the *Bible and Sun*,
in *St. Paul's Church-Yard*; and J. HOEY, jun.
in *Skinner-Row*, *Dublin*, MDCCLXI.

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OF A
CURIOUS COLLECTION
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The History of all Nations
in which the
Connections and Relations
of the several Kingdoms are
Every Relation is made concise and plain
AND
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Illustrated with Engravings
With Volumes of Maps and Prints
By the late Mr. H. K. L.

VOL. XX.

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A

DESCRIPTION

OF

SPAIN and PORTUGAL.



CHAP. I.

Of Spain in general; with the Climate and Produce of the Country. A Description of Madrid, and of the Escorial.

OF all the countries in *Europe*, none are less visited by strangers, except the maritime towns, than *Spain and Portugal*, which is partly owing to their situation, in a kind of peninsula in the most western part of the continent of *Europe*, out of the road.

to other countries; and partly to the pride and bigotry of the inhabitants, their ignorance of the arts and manufactures, and these countries containing few monuments of antiquity.

Spain is encompassed on every side by the sea, except on that of *France*, from which it is separated by a continued range of mountains called the *Pyrenees*, which are almost eighty leagues in length, and extend from Cape *Olarzo*, in the bay of *Biscay*, to Cape *Creux* in the *Mediterranean* sea. As it has many ranges of high and pleasant hills, beautiful plains, and a variety of rivers, it is both a delightful and a healthy country; free from the scorching heats to which *Africa* is exposed, and from the severe frosts that are felt in more northern climates. The summers are indeed excessive hot; but this sultry weather lasts but about two or three months, while the remainder of the year is temperate. The air is generally serene and clear; the great rains fall regularly in spring and autumn, and it is observable, that as with us most diseases proceed from cold, so in *Spain* they are generally the effects of heat.

The most northern parts of *Spain* are the most mountainous and barren: but some of these mountains are covered with trees, and the rocky parts with thyme, marjoram, and other aromatic herbs, which serve for food to sheep and goats, and give their milk and flesh a finer relish, than any have that are fed on the richest pastures. If these herbs happen to be scorched up with the violent heat of summer, the cattle are driven down to the sides of the mountains, where



where they find a greater plenty of these herbs, and in many of them a great deal of grass; but if these also fail, as they sometimes do, thro' the excessive drought, the inhabitants are obliged to remove their flocks to the meadows.

The *Spanish* wheat is inferior to none in *Europe*, and the inhabitants produce more than they can consume. Their barley is very good, and in such plenty, that it is the common grain for the horses and mules instead of oats, which are here very scarce; the barley straw serves them instead of hay, of which they make hardly any through the kingdom. They have wine in such abundance, that it is drank by the poor: but the *Spaniards* being naturally sober, seldom drink it without a great mixture of water, and their women rarely taste it, except in their lyings-in, or on some such extraordinary occasions. Besides the fruit commonly cultivated in *England*, they have excellent citrons, lemons, oranges, almonds, prunes, olives, dates, figs, chefnuts, pomegranates, capers, and grapes, of which last they not only make wine, but dry great quantities for raisins; and their oil, wax, and honey are as good as any in the world.

Few countries exceed this in the plenty, goodness, and variety of fowl both wild and tame; or of four-footed game, as deer, both red and fallow, hares, rabbits, and particularly wild boars; and with respect to their tame swine, the *Spanish* bacon is said to exceed that of *Westphalia*.

The *Spanish* horses are famed for their swiftness, and therefore great numbers are exported at a great price to other nations: those bred in the province of *Estremadura*, and the adjacent parts are reckoned the finest and swiftest. Their mules are even larger, stronger and more sure-footed than their horses. Some of these are fine beasts, and used for drawing the coaches of the greatest nobility, and for travelling over the most craggy and mountainous parts of the country; but they are nothing near so swift as the horses.

Spain has likewise rich mines of quicksilver, copper, lead, allum, sulphur, and the iron and steel of *Biscay* is esteemed the best in *Europe*. Formerly the *Spanish* mines yielded the *Romans* more gold and silver, than any country under their dominion, though now these mines are either lost, exhausted, or not worth working.

We shall now take a View of the principal places in *Spain*.

Madrid, the residence of the *Spanish* Monarchs, is the capital of *New Castile*, and of the whole kingdom. It is situated in the midst a large sandy plain surrounded with hills; but has neither wall nor ditch. On its west side runs the river *Mauzanares*, over which is a stately stone bridge. The city is said to contain 400 streets, most of which are wide and strait, but so excessively dirty, that the stench may be smelt at the distance of above a mile. Most of the houses are handsome and lofty: they are generally built with brick; and the most of them with lattice windows, chiefly of canvas

canvas or some slight oiled cloth. The houses of the nobility are generally built of stone in an elegant taste, some with sashes, and others with casements; but during the heat of summer, the glass frames are taken down, and in their stead others covered with gauze, or the like thin stuff are put up, to let in the air. The city has fourteen squares, most of which are very fine ones, especially that called the *Place Mayor*. In this square is a large market, and here also are exhibited the bull-baitings, and other public shews. It is 436 feet long, and 334 broad, and the houses are on each side supported by an arcade, like that of *Covent-Garden*, to shelter the people from the rain. They are all five stories high, and exactly uniform, with balconies to each story. Whenever the ladies stand in their balconies to see an extraordinary shew, they are not only richly dressed, but both the balconies and the fronts of their houses are adorned with the richest tapestry and pictures, and if it be in the night, with a vast number of wax candles. For it is only upon such occasions, that the fair sex are allowed to appear unveiled. This city has 18 parishes, 57 monasteries and nunneries, a great number of chapels, with 22 hospitals.

At the end of the town is the *Prado*, or *Pardo de St. Hieronymo*, a delightful plain, shaded with rows of poplar-trees, and adorned with twenty-three fountains. Thither the nobility and gentry repair every evening in their coaches, or on horse-back.

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At the extremity of the *Prado* is a noble palace called *El Buen Retiro*, or the Good Retreat, designed by the *Spanish* monarchs as a place of retreat from the hurry of the court and town. It consists of a spacious square, built with brick, that contains many noble apartments with the richest furniture, and with paintings by the greatest masters. The gardens have delightful shady walks, water-works, and statues. On the canals are pleasure boats, and on their banks summer houses, for the musicians to divert the King, while he takes his pleasure on the water.

There are two other royal palaces here, one a spacious and magnificent edifice on the west side of the city; the main structure consists of three courts, about which are the apartments for the royal family, with the proper offices and lodgings for the household; and the other is called *Casa del Campo*, where the King sometimes refreshes himself during the heats of summer, in the cool shady walks, which are the principal convenience of this seat.

Besides these, the principal things to be seen at *Madrid*, are the churches, some of which are very richly adorned: the King's chapel, the prison, and the houses of several of the *grandees*, are well worth seeing on account of the excellent paintings with which they are adorned; for in collecting these they spare no expence.

The most noble palace belonging to the King of *Spain* is the *Escorial*, which was originally erected by *Philip II.* who raised the church and

mo-



A View of the Escorial in Spain, taken on the Spot.

monastery of *St. Laurence*, the *Spanish* martyr, in gratitude for the assistance he supposed he had received from his tutelary Saint, in obtaining the celebrated victory over the *French* at *St. Quintin*, in the year 1557.

This royal monastery stands near a small village called the *Escorial*, nine leagues west of *Madrid*. It is built of a beautiful white stone, veined with blue and brown, and of a very fine polish; and is surrounded by the most delightful prospects. It is in the form of a vast quadrangle, containing 580 feet in front from east to west. At each extremity is a superb range of building that extend 430 feet north, and are again joined by another front of the same dimensions as the former. So that it properly consists of four fronts, and at each angle is a tower. The principal front has three gates, of which that in the middle is supported by four *Doric* columns of speckled marble on each side, and over them are others of the *Ionic* order. Above the portal is a beautiful statue of *St. Laurence*, of white marble, 15 feet high, dressed in the habit of a Deacon, with a book in his left hand, and a large gridiron of bronze in his right. In this front are two hundred and forty-seven windows.

After passing the principal gate, you enter a portico that extends from the college to the convent. Over it is the library, and in the front are three noble arches leading into a grand court, where the eye is struck with the magnificent frontispiece of *St. Laurence's* church, on each side of which is a lofty tower,
and

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and in the centre a dome. It has five grand arches that form the entrance into the vestibule, and on the lower part of the portal are six large statues placed on pedestals, of *David*, *Solomon*, *Hezekiah*, *Josiah*, *Manasseh*, and *Jehosaphat*, with crowns of bronze enamelled with gold on their heads, and sceptres in their hands.

The whole structure is supported by four very strong square pillars round the centre of the church, forming four grand arches. Every pillar has two altars, and two niches over them, and in the niches of the pilasters along the walls on both sides, are altars answerable to the others. Besides these, the whole circuit of the church is surrounded with very elegant chapels, and over these are galleries with brass balustrades extending quite round. The cupola is encircled by two galleries, and crowned with a lantern, that has eight windows divided by pilasters gradually diminishing to the top, where there is another small dome on the crown of the lantern, and over this a fluted stone obelisk, on the top of which is a globe of gilt brass, with a cross and vane. The doors are nine in number, and over the arches of the principal of these, and on the great altar, are twelve crosses, of a very beautiful red jasper. The altars amount to forty, all of which are richly adorned with carved work, and innumerable paintings, many of them by the greatest masters.

You next view the great chapel, the ascent to which from the church is by twelve steps of red jasper. The pavement of this chapel

pel consists of mosaic work of jasper and marble of various colours, arranged in the most beautiful compartments. The altar-piece is adorned with all the orders of architecture except the *Tuscan*. You first see six *Doric* columns, in the middle of which the tabernacle is placed, and in the compartments of the other columns are several paintings of sacred history. Their bases and capitals, with those of all the other columns and pilasters behind them, are of brass enamelled with gold, the shafts are of jasper, beautifully polished and fluted.

The niches at the two extremes contain the statues of four Doctors of the church in gilt brass, which has a fine effect, the jasper of the niches being green. In the spaces on each side of the tabernacle, are two pieces of painting; the one of the nativity, and the other of the eastern *Magi* worshipping the infant *Jesus*. The second range of columns is of the *Ionic* order inlaid with green in the compartments, and in the extreme intercolumniations are niches of green jasper, containing the statues of the four Evangelists, of the same materials and beauty with the former. The principal picture over the tabernacle, represents the martyrdom of *St. Laurence*, and in the side compartments, are our Saviour bound to the pillar, and his carrying the cross; all by *Zuccaro*. The third range consists of only four columns of the *Corinthian* order, the extremes of the lower rank being supplied by two pyramids of green jasper, between which are fine brass statues of *St. James*, the patron of *Spain*, and *St. Andrew*, both

both larger than the life. In the middle is the picture of the assumption of the *Virgin Mary*; and on the sides are those of the resurrection; and the descent of the Holy Ghost. Two columns of the Composite order support the frontispiece, which terminates in the principal arch of the chapel. The compartment is green jasper, in which is a crucifix of brass gilt, with the statues of the *Virgin Mary* and *St. John* standing on the sides, and those of *St. Peter* and *St. Paul*, on the extreme pedestals. The whole height from the pedestal of the *Doric* order, to the centre of the grand arch is 93 feet, and the breadth 49. The above tabernacle stands on a pedestal of jasper, within an arched portal, whose pilasters are of red and green jasper. The form is globular, and the order *Corinthian*. The materials are all gems, and brass enamelled with gold. The first pedestal is of jasper finely inlaid. It supports eight jasper columns of a deep red veined with white. In the intercolumniations are four niches, with as many statues of Apostles. Over the cornice is another base, with eight pedestals supporting the like number of statues in gilt brass: it also sustains the cupola, which is divided into four compartments inlaid with jasper. Above is a small lantern crowned with another cupola, and over all is an image of our Saviour of the same metal as those of the Apostles. In the lower part are two doors of rock crystal leading into the sanctuary, the jaumbs and lintels of which are of a beautiful green jasper; the other parts consist of jasper

of several colours, and polished brass. In short, this whole chapel is adorned with the richest Mosaic work, and a great variety of other statues and paintings.

The convent consists of five beautiful cloisters, and may be entered from the church. The principal cloister is as large as the other four, it extending 210 feet from north to south, and 207 from east to west. Its grand stair-case is forty feet broad, the steps are of the most beautiful stone, each of one piece, and the balustrades are of exquisite workmanship. The arcade above is adorned with painting exhibiting the founder's motives for erecting this edifice; and the whole structure is adorned with the works of the most celebrated *Spanish* and *Italian* painters. Within the body of the cloister is a flower garden, embellished with reservoirs and fountains; in niches on the sides are the statues of the four Evangelists, bigger than the life, of white marble.

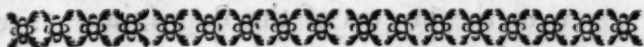
In the gallery of the royal apartments are excellent paintings by *Basan*. Along the wall are represented two curtains hanging down from hooks, so naturally, that the spectators often endeavour to lift them up. On these curtains are painted the battle fought by Don John II. against the *Moors* of *Granada* in the plains of *Higuernala*; and the battle of *St. Quintin*. At the two extremities are two naval victories, gained off the isle of *Tercera*: and the cieling is covered with stucco-work.

In

In the south saloon are two doors brought from *Germany*, inlaid with exquisite beauty, and a variety of fine wood. The inside is adorned with exquisite paintings. The next is the apartment of King *Philip II.* where he died. Here the furniture, cieling, and walls are plain, and the floor is brick. It is, however adorned with small statues of Saints, some very beautiful pictures of the *Virgin Mary*, and other religious pieces. From this apartment is a passage to the *Queen's*, which is of the same construction.

The library is 195 feet long, 32 broad, and 36 in height. The pavement is of black and white marble in beautiful knots. The concave part of the cieling is finely painted by *Pelligrino*, exhibiting Divinity, Phylosophy, Grammar, Logic, and all the Sciences, surrounded with proper groupes of figures. But the number of books amount to only eight thousand. However, two other rooms have been added, and the books in all three exceed 18,000.

The last part of this superb structure we shall mention is the *Pantheon* chapel, the sepulchre of the *Spanish* monarchs, which is incrustad and embellished with the most exquisite work in marble, jasper and gilt brass, adorned with carving, statues, and painting.



C H A P. II.

A Description of the Cities of Saragossa, Toledo, Valencia, Alicant, Carthagenæ, Malaga, Cadiz, Seville, and Gibraltar.

TH E next city we shall describe is *Saragossa*, the capital of the kingdom of *Arragon*, which is situated in a delightful plain at the confluence of the rivers *Ebro*, *Salon*, *Gallego*, and *Guerva*, which render the adjacent country delightful and fertile; from hence the city is well supplied with corn, wine, oil, fruits, and plenty of fish and fowl. It is surrounded with walls and towers, and has four handsome gates facing the four cardinal points, with two bridges over the *Ebro*. The city is of an oblong figure, and contains not only many handsome churches, hospitals, squares, and streets, but has extensive suburbs. 'Tis divided into fourteen large parishes, and has 23 monasteries, 13 nunneries, and a noble hospital, endowed with a revenue sufficient for maintaining 800 sick persons, besides two others for orphans, and several alms-houses for decayed people. There is here also a famous university. The cathedral is a rich and stately building; in which the tabernacle over the high altar, is a magnificent piece of workmanship, all of massy silver, finely wrought, and weighing 612 pounds. The royal palace stood at a

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small distance without the city; but has been given to the officers of the inquisition. The collegiate church of our Lady of the pillar, thus called from a pretended miraculous image of the Virgin holding an infant *Jesus* in her arms, in likewise a fine structure, which they affirm was built by St. *James* the Apostle. The above image is very small, but its crown and robes are almost entirely covered with precious stones. It is placed very high on a pillar of jasper of exquisite beauty, and a great number of silver lamps are kept continually burning in the chapel in which it stands, the walls of which glitter with gilding and precious stones. To this image a vast number of pilgrims annually resort, to pay their devotions before it.

Toledo, the capital of *New Castile*, and anciently the royal seat of the *Goths* and *Moors*, is 36 miles from *Madrid*. It stands on a steep and craggy rock, and has two stone bridges over the *Tagus*. The land side is fortified by a double wall, that has 150 towers, and five large gates, besides posterns. The plain below is spacious, fertile and pleasant, and so well watered by the *Tagus*, that it produces corn, wine, oil, and every thing that can be desired for conveniency or delight. The city has twenty-seven parishes, thirty-eight monasteries and nunneries, two large colleges, and twenty-five hospitals; and yet the inhabitants are said not to amount to above five thousand families. The streets are narrow and steep, but there are said to be no less than 17 squares

and markets. It has a spacious old palace taken from the *Moors*, the stables of which can hold at least 500 horses. The cathedral is a noble structure, 384 feet long; and 191 broad. Eight large and beautiful brass gates with magnificent porticos lead to this edifice. Its roof is supported by eighty-eight lofty pillars, which divide it into five isles, the middlemost of which forms two choirs, beautifully carved and inlaid: one called the chapel of the Blessed Sacrament, has been the burying place of many of the *Spanish* monarchs, and is inclosed within costly iron gates, and on each side stands a brass pulpit on pillars of the same. The other choir, which belongs to the Canons, is inclosed in the same manner, and beautified with curious carving in wood and jasper. The outside of both is adorned with statues in niches, and other ornamental imagery, representing the history of the *Old* and *New Testament*. The image of the *Virgin Mary* in this cathedral has a garment covered all over with pearls and precious stones, and the paintings are answerable to the rest. In short, this is one of the richest cathedrals in the world, and the archbishopric, in its power and revenue, is next to that of *Rome*; so that the late Queen of *Spain* obtained it from the Pope for one of her sons.

The next place of importance we shall mention is *Valencia*, the capital of the province of the same name. This city is seated on the banks of the *Turio*, over which it has five bridges, at the distance of about a mile and a half from

from the sea, and is situated opposite to the place where the famous city of *Saguntum* formerly stood. It is almost of a circular form, and is surrounded by a wall that has many towers and gates. *Grao*, its sea-port, which stands on the *Mediterranean*, furnishes it with a variety of sea fish, and the neighbouring lake of *Albusera*, with abundance of water fowl, and fresh water fish, as does the fertile country round with corn, wine, oil, fruit, herbs, and other provisions. The parts about the city being well cultivated, are very populous, and the inhabitants amount to about 15,000 families. It has 48 monasteries and nunneries, besides other foundations of the military order, six chapels, and six hospitals. Here is also a celebrated university which has five colleges. *Valencia* is the see of an Archbishop, whose revenue is worth 30,000 ducats *per annum*. A great variety of manufactures are carried on here, especially the woollen, so that the cloth made in this city is reputed the finest in *Spain*. The silk manufactures flourish likewise here, the women and children spinning it before their doors. They export large quantities of wine, oil, and fruit; and the inhabitants have now an easy, agreeable conversation, without any of that stiffness observable in the rest of the *Spaniards*.

In this province is also *Alicant*, which is sixty miles south of *Valencia*, and the same distance north of *Carthagera*. It is a famous city and port in the *Mediterranean*; the harbour is defended by several bastions, and the city, tho' not

not strong, is well walled, and defended by a castle built on a high rock. On the neighbouring shore stand several watch towers. This city, which is well known to the *English* for its wines and fruit, is situated between two hills, and from its vicinity to the sea has a pleasing prospect of ships continually passing to or from the *Mediterranean*. It has a large cathedral, dedicated to St. *Nicholas*, two parish churches, six convents, and two nunneries. The city is said to contain between 30 and 40,000 communicants.

*Carthagen*a, a city in the province of *Murcia*, was built by *Asdrubal* the famous *Carthaginian* General, 225 years before *Christ*, and lies on the side of a hill, at the mouth of the river *Guadulantin*, which forms a fine bay in the *Mediterranean*; but contains only 1200 inhabitants, and has but one parish, though it has four monasteries, and two convents of nuns.

The next city we shall mention is *Malaga*, in the province or *Grenada*, which is also pleasantly situated on the coast of the *Mediterranean*, and has one of the best roads in all those parts, into which extends a fine mole 530 paces long, and twenty broad, with stairs for taking water, and a chapel for the sea-faring people. The city is large and of a circular form; surrounded by a double wall, that has several towers, and nine gates. It is also defended by two castles, one at the top, and the other at the foot of a steep mountain, at the bottom of which the town is situated. On one side the sea washes its walls, and on the other runs the

Guadalmedina, over which is a strong bridge.

The neighbouring grounds are covered with vines, and with a great variety of fruit-trees; vast quantities of wine, raisins, figs, almonds, lemons, oranges and other fruits being exported from thence.

To the west of *Malaga* is *Cadiz*, the celebrated *Gadir* or *Gades* of the ancients, situated in the same province, on the north-west extremity of a long neck of land in an island, which is joined to the main land by the bridge of *Suaco*; both extremities of which are defended by strong works. The island on which *Cadiz* stands, together with the opposite shore, form a bay twelve miles long, and about six broad; near the middle of this bay are two points of land, one on the continent and the other on the island 500 fathoms asunder, on which are the forts *Puntal* and *Matagorda*, that command the passage: within these points is a large and good harbour, which no enemy can enter, till the forts have been first taken. The *English* forces commanded by the Earl of *Essex* landing in the island in 1596, took and burnt the town, after they had plundered it of immense treasures, and destroyed the galleons in the harbour. The city contains about 5000 houses, and 50,000 inhabitants, and being the centre of all the *American* trade, the galleons there take in their lading, and return with the treasures and rich merchandizes of *Peru* and *Mexico*. The city is surrounded with walls and bastions, but its greatest strength arises from the

the steepness of its coast, its rocks and sand banks.

At a few leagues distance to the north lies *Seville*, the *Hispal* of the ancients, situated in a fertile country on the river *Guadalquivir*, over which there is a stout bridge of seventeen boats, that joins the city to a large suburb on the other side, called *Triana*, where is an inquisition. The circuit of the city, including the suburbs, is fourteen miles; but the wall is only eight. It is pretty strong, and has fifteen gates, and 166 towers. The number of its inhabitants is computed at 300,000. The cathedral is a large structure partly in the *Gothic*, and partly in the *Moreisco* taste, and its steeple, like that of *St. Mark's* at *Venice*, is ascended to the top by planes gently inclining. Here is an university, in which the students are very numerous. Along the river are commodious quays, where vessels of large burthen may lie in safety. The palaces of the Viceroy, the Archbishop, and the antique palace built by the *Moors*, are large structures. Here also is an ancient aqueduct. Bread, wine, flesh, and all other commodities are extremely dear in this city, except olives and pomegranates, which are better here than in any other part of *Spain*.

The last place of importance we shall mention in this extensive country is *Gibraltar*, the *Calpe* of the ancients, a famous port town and fortress of *Andalusia*. The town, which is neither large nor handsome, stands at the foot of mount *Calpe*, about 16 miles north of *Ceuta* in *Africa*. It is built upon a rock, in a peninsula,

fula, and is accessible only on the land side, by a narrow passage between the rock and the sea, across which the *Spaniards* have drawn a fortified line, chiefly with a view to hinder the garrison of *Gibraltar* from having any intercourse with the country behind them. The harbour of *Gibraltar* is formed by a bulwark properly fortified and planted with guns.

The peninsula upon which the fortress of *Gibraltar* is built commanding the streight of the same name at the entrance of the *Mediterranean*, has been justly considered as a place of the utmost consequence. It was taken in 1704 in two days by a combined fleet of *English* and *Dutch* ships under the command of Sir George *Rooke*: but the same year the *Spaniards* attempted its recovery, at which time it stood out a memorable siege, in which between 4 and 500 of the enemy having crept up the rock that covers the town, were the next morning driven down headlong: after which it was ceded to the *English* by the treaty of *Utrecht*, in 1713. The *Spaniards* again made an attempt, in the year 1727, with a powerful army; but were at last obliged to raise the siege, after lying before it several months, and even endeavouring to blow up the rock, which they found to be impracticable, it therefore still belongs to the crown of *Great Britain*.

Having thus described the principal cities of *Spain*, it will be proper to mention the manners and customs of the inhabitants in general. Notwithstanding a great part of the country is so extremely fertile as to be capable of
affording

affording all the conveniences and luxuries of life, in the greatest profusion; it is but thinly peopled. This is owing to the expulsion of the *Moors* about 200 years ago; to the vast numbers that have left, and are still leaving their native country to settle in *America*, and to the religious bigotry of the people, and the terrors of the inquisition, which will scarcely permit foreigners to settle among them, and occasions a multitude of persons of both sexes to be shut up in convents. Hence it is not surprizing that most places are very thin of people, and that there are in this country vast tracts almost desolate. Thus in all towns, especially those in the south and west parts of this country, are to be seen the ruins of many houses.

The *Spaniards* are grave and solemn in their behaviour, and are always dressed in a short cloak and coat, and appear abroad with a long sword, curled whiskers, and a pair of spectacles on the nose. Pride of birth is nowhere carried to a greater height, and the insinuation that a man is descended from the *Moors*, who a few ages ago inhabited the greatest part of the country, is sufficient to make him stab the slanderer, or procure his being privately assassinated. This pride, added to the indolence of the people, has prevented the arts being carried to the same perfection in *Spain* as in the rest of *Europe*; and they have been obliged to have recourse to the labourers and artificers of other nations to furnish them with such commodities as they might easily procure by

by their own industry. Hence not all the mines of *Peru* and *Mexico* have been able to make them rich. They are universally too much given to women, and their jealousy, where either their wife, daughter, sister, or even mistress is concerned seldom fails to end in bloodshed; for they think no means too base, violent, or unjust, to wipe off any stain that is cast upon their honour, or to gratify their revenge. They affect an haughty air with those with whom they are unacquainted; but no people in the world are more courteous to those with whom they are intimate.

The *Spaniards* are greatly attached to their old notions, and the discouragement given to printing has retarded the dawn of true science; but it begins to appear, philosophy has begun to shew itself in *Spain*, and the mechanic arts are less despised than they were formerly. The most amiable part of their character is their honesty and fidelity to their engagements, for which they have been always celebrated.



C H A P. III.

Of Portugal in general; the Produce of the Country, and the Customs and Manners of the People. A Description of the Cities of Lisbon, St. Ubes, Oporto, Coimbra, Santerem, Portalelvas.

TH E kingdom of *Portugal*, is situated to the west of *Spain*, from which it is separated on the north and east by the river *Minho*, and some small rivers and hills; on the south and west it is washed by the sea. Its whole extent from north to south is 300 miles, and its breadth from east to west, where broadest, is about 120. It is in the same climate with *Spain*, and as well as that country, is very mountainous; but the soil is in general worse, and never produces corn enough for the support of its inhabitants: as to wheat it has always produced less of that valuable grain than what the people require. In the southern parts pasture is always scarce, and the cattle small and lean, though the flesh is generally well tasted. But to make amends for this want of corn and pasture, here are made vast quantities of wine, which is indeed the best commodity of this kingdom. Oil is likewise here made in great abundance, but it is far inferior to that of *Spain* and *Italy*. Lemons and oranges likewise grow here, and are exported in great

great quantities, tho the acidness of the latter are not near so pleasant, as those that come from *Seville*; nor indeed are their raisins, figs, almonds and chesnuts either so large, or so well tasted as those of *Spain*. However, their sweet oranges, which they have introduced from *China*, and are thence called *China* oranges, are the best of the kind in *Europe*. Herbs and flowers of all sorts are here commonly very good, and abundance of perfumed waters are distilled from those of the odoriferous kind, which are here in great request, they being used in almost every thing that is eat, drank, or worn. This country also produces great quantities of alum, white marble, alabaster, and especially salt, of which immense quantities are exported from the port of *Setual*. The woollen manufactures of this country are so indifferent and coarse, that they are only worn by the meaner sort, and though their silks are in some places much better, they are far inferior in beauty and goodness to those made in *Spain*. The country is, however, in general pretty well peopled, and the inhabitants, especially of the sea-port towns, are much richer than the *Spaniards*.

The women are mostly beautiful while young, though their complexion is inclinable to the olive; but the indiscreet use of paint renders their skins shrivelled as with old age, before they are turned of thirty: but their eyes, which are generally black and sparkling, retain their lustre after their other charms are withered. The quick decay of beauty is, however, in some measure

measure recompenced by the vivacity of their wit, in which they are said to excel the women of all other nations. They are extremely charitable and generous, and remarkable for their modesty. Spectacles are commonly worn here as well as in *Spain*, as a mark of age and gravity; for it is observable of these two nations, that old age, with a grave and solemn behaviour, procure such respect, that the young affect to imitate the solemnity of the old.

The dress of the *Portuguese* like that of the *Spaniards*, never used to vary till of late, especially among the men. However, these still commonly wear a close doublet, wide breeches, a short cloak, and a long sword. Their garments are either of baize, or some such light stuff, or of silk, according to the quality of the person, and the season of the year. The women who go abroad on foot use long veils that cover their heads and most of their bodies, but leave the face bare. When those of quality go out in their coaches or litters, they wear fardingals, short doublets, and long petticoats that cover their feet. Their hair hangs loose in curls, and is intermingled with jewels; and some wear a dagger by their side, instead of a fan. In the house their dress is more airy, their doublets shorter, and open before, so that their linen appears quite round the waist, as well as at the bosom. The maids generally appear in their hair, though some of them cover it with a fine sort of muslin or gauze; but of late years both sexes seem to give into the *French* mode. To so extravagant a height do the

grandeess and their ladies carry their pride and arrogance, that they stand upon the nicest punctilios with respect to rank and titles ; and the ladies of quality are even served on the knee by their maids and slaves ; indeed the women of quality will scarce be spoken to by mean people in any other posture. A degree of haughtiness peculiar to this country !

The sole religion professed in *Portugal* is that of the church of *Rome*, no other being suffered, or scarcely known throughout the country, except that of the *Jews*, who are here in great numbers, though concealed ; for the better to escape notice, they not only go regularly to mass and confession, but strive to outdo those of the *Romish* church in their zeal for the national religion. But if any of them are discovered, they are immediately seized by the officers of the inquisition, when if they will abjure *Judaism*, they are only condemned to suffer some corporal punishment, or public shame ; but if after being converted and pardoned, they are found to relapse into *Judaism*, they are cruelly condemned to the flames, and executed in a public manner, with the most pompous and dreadful apparatus. Foreign *Protestants* who have never embraced the *Romish* religion may live here undisturbed, provided they neither offend the government, nor affront the established church. The inquisition also punishes those who are charged with sorcery, witchcraft, blasphemy, sodomy, and other crimes.

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The principal cities of this kingdom are *Lisbon*, *St. Ubes*, *Oporto*, *Coimbra*, *Santercim*, *Portalegre*, and *Elvas*.

Lisbon, by the *Portuguese* called *Lisboa*, the metropolis of *Portugal*, is situated on the north banks of the *Tajo* or *Tagus*, about ten miles from its mouth. It is about six miles long, and is built upon seven hills, winding with the river, from which it rises in the form of an amphitheatre. On one of them stands a castle that commands the town, which is surrounded by a wall that has 77 towers, and before the dreadful earthquake on the 1st of *November* 1755, was supposed to contain 30,000 houses, and 150,000 inhabitants. The streets being principally in the valleys between the hills, are narrow, dirty, and some on the sides of them are very steep, which render them inconvenient for coaches, so that litters are generally used. The houses of the citizens are commonly mean, with lattice windows; but those of the nobility are elegantly built of stone, and have large gardens. Here are several handsome squares, the finest of which called the *Rosa*, had the house of inquisition at the upper end, and also *St. Dominic's* church, which belonged to that office, where the *Jews*, with the supposed heretics and witches were tried before the King and nobility. This was one of the largest and most beautiful churches in *Lisbon*; the west end was covered with pictures of the heads of those who were executed, taken from the life, and placed in rows. Adjoining to this edifice was a large convent of *Dominican*

Friars. Near this square was another fine one called *Terreira de Passô*, in which was the King's palace, a large and commodious structure which took up one side of it, and the custom-house, corn-market, and meat-market were on the others. From the palace might be seen large fleets of ships lying in the harbour, and others continually sailing in and out. In this square they hold their bull-baitings, the diversion of the great, at which all persons of distinction assemble; and here the officers of the inquisition perform the *Auto de fé*, on which occasion several persons of a different persuasion from that of the *Romish* church are annually burnt alive, in sight of the King, Queen, and the whole court; and to the disgrace of the *Portuguese*, both the gentlemen and ladies of the greatest quality are taught to rejoice, and to shew a barbarous pleasure at these inhuman spectacles.

Besides the cathedral, there were 37 parish churches, with 23 monasteries and convents for Monks and Nuns, which were generally handsome structures, richly adorned within. The cathedral in particular is a vast edifice, but heavy, clumsy, and of the *Gothic* taste; yet as it stands upon one of the seven hills, it at a proper distance affords a most noble prospect. However, what it wants in elegance and beauty on the the outside, is amply made up by the richness of its ornaments within, as statues, paintings, and utensils of gold and silver enriched with the most costly gems. Among the many noble hospitals in this city, is
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*A View of the Ruins of St. Nicholas Church, and other Buildings in Lisbon.
taken on the Spot.*

the celebrated house of mercy, which not only constantly breeds up 60 boys, and portions out out 114 maidens; but distributes an incredible number of other charities, as relieving prisoners for debt, maintaining of decayed persons that cannot beg, and assisting families that are ashamed to let their wants be publicly known. The Great hospital is obliged to receive all persons of whatever nation or religion; nor is this charity confined to the sick, or to such as meet with casual misfortunes, as broken limbs, blindness, &c. but extends to naturals, lunatics, and foundlings. The city, before the great earthquake, afforded a noble prospect when viewed from the river, on account of the gradual ascent of the buildings; nor is the prospect less agreeable from the town of the river, which is three miles over, and filled with ships from every nation in *Europe*; and farther still, the eye is entertained with the distant view of a fine country interchangeably mixed with towns and villages.

But on the 1st of *November* 1755, at about ten in the morning, the above-mentioned dreadful earthquake began, which laid the finest buildings of *Lisbon* in ruins, and reduced that city to a scene of the most terrible desolation. To complete the public distress, a fire soon after broke out, and spread among the ruins; and by these disasters the King's palace, the custom-house, *St. Dominic's* church, *St. Nicholas's*, and many others were either thrown down or consumed; together with a great number of private houses:

but happily some whole streets were entirely standing.

About 21 miles below is the port of *St. Ubes*, or rather *Setubal*, as it is called by the *Portuguese*. This city was the *Cetobriga* of the *Romans*; it is situated on a spacious bay close to the ocean, and is much resorted to by most northern nations on account of the vast quantities of salt annually made there. The town has a strong wall, thirteen gates, many towers, and some other out-works and fortifications. On the sea-side are two forts or castles, one an old one, and the other of modern construction. The inhabitants are computed at about 3000, and the city has four parish churches, three monasteries, two nunneries, five chapels, a house of mercy, two hospitals, and two conduits, to which the water is brought from a good distance by a stately *Roman* aqueduct, supported on a great number of arches. This city is one of the most flourishing places in the kingdom; but it suffered very greatly in the earthquake that was so fatal to *Lisbon*.

The next city we shall mention is *Oporto*, or *Porto*, which is a sea-port on the north side of the *Duero*, about three miles from the sea, and is situated on an uneven rocky ground, that river washing its walls. The harbour is safe against all winds; but when the floods come down, no anchor can hold the ships, at which times they are forced to fasten them to each other along the walls, to avoid the fury of the torrent. The streets of the city are narrow and irregular, but well paved; the natural
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rock in some places forming part of the pavement. The edifices are of the ancient kind, but handsome and built with stone. The churches are stately, and some even magnificent, particularly the cathedral. There are here five parishes, nine monasteries, four nunneries, eight chapels, four hospitals, a house of mercy for relieving those in distress, and the inhabitants amount to about 4000.

Coimbra, is a very ancient city pleasantly seated on the north side of the river *Mundega*, over which it has a good bridge of 29 arches. The walls of the city are lofty, and have four handsome gates, adorned with many towers and turrets, and the buildings are stately though ancient, especially the palace, which still retains some marks of its former splendor. The city is inhabited by about 5000 families, and has seven parish churches, and five monasteries, one of which called the convent of St. *Cruz*, or of the Holy Cross, is a large and noble structure, and inhabited by none but noblemen, who embrace the order of St. *Augustin*. Here are also five nunneries, an university which sometimes contains 3000 students, and is the most celebrated seminary of learning in the whole kingdom; a house of mercy, and a noble hospital.

Santareim, or *Santereim* a corruption from St. *Irene*, who is held in great veneration there, is a very ancient city situated on a high hill close by the *Tagus*. On the south side it has a deep valley, with a steep winding ascent from the town, and on the north is a craggy solid rock altogether

altogether inaccessible, from which the ancient *Moorish* inhabitants used to precipitate their state prisoners : but on the west it faces a delightful plain covered with gardens, orchards, and fertile fields, that produce vast quantities of corn, oil, and a variety of fruits. The walls of the place are strong, though very old. There are here thirteen parish churches, one of them collegiate ; seven monasteries, two nunneries, several chapels, two hospitals, and a house of mercy. The inhabitants, who amount to about 3000, carry on a considerable trade on the river, and are laborious, warlike, and polite.

Portalegre is seated on the side of a high mountain, in the province of *Alentejo*, and is well walled, and defended by eight strong towers, and an old castle. It has eight handsome gates, and is supplied with water by ten fountains, one of which flows with a constant stream out of nine mouths. The inhabitants, who here carry on a woollen manufacture, though of a mean sort, amount to about 3000, who are divided into five parishes ; and here are three monasteries, two nunneries, nine chapels, one hospital, and a house of mercy.

The last place of importance in this kingdom we shall mention, is *Elvas*, which is six miles from the river *Coa*, that divides *Spain* from *Portugal*. It was an ancient city of the *Helvi*, and from the number of inscriptions still to be found there, it appears to have been a considerable place under the *Romans*. The country about it is very pleasant and fertile, and in particular produces abundance of oil. The city has
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a double wall, with many towers, and a strong castle. It may justly be esteemed the strongest fortress in all *Portugal*, it having seven bastions, besides demi-bastions, and half-moons. Besides the cathedral, there are four parish churches, three monasteries, two nunneries, thirteen chapels, two hospitals, and a house of mercy. At a small distance are the remains of a noble aqueduct, above ten miles long, and of a great height; especially in some places, particularly where the ground runs low, it has no less than four arches, one over the other.



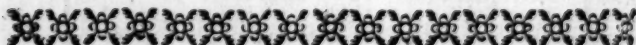


A

DESCRIPTION

OF

S W E D E N.



CHAP. I.

Its Soil, Climate, and Produce; its Beasts, Birds, Fishes, and Mines; with some Account of the Inhabitants.

SWEDEN is a very extensive country, bounded by *Lapland* on the north, by the dominions of *Russia* towards the east, by the *Baltic* sea towards the south, and by *Denmark* and *Norway* to the west: but there are a great number of barren mountains dispersed over the country, from which fall innumerable rivers or rather torrents, few of which are navigable, on account of the rocks and cataracts that obstruct their passage; and these form many great

great lakes, some of which are of considerable extent: if therefore abatements be made for the barren mountains, the large lakes, woods, heaths, and marshes with which this country abound, the habitable part will appear very small.

Among these lakes, one named the *Fetter* is very remarkable. It separates east and west *Gotbland*, extending above 80 miles from north to south, and is about 18 broad in the middle. Its water is very clear, and in some places so deep as not to be sounded by a line of 300 fathoms. This lake has but few islands, and is often disturbed by storms, which sometimes begin so suddenly, that the surface is agitated before the least breath of wind is perceived; so that the cause seems to proceed from the bottom of the water; and it is not uncommon for boats in one part of the lake to be tossed by a storm, while others at a small distance are in a perfect calm. Immediately before a storm, while the sky is yet clear, a noise is perceived in the lake like thunder, which Dr. *Hearne* tells us, he had often heard, and was always followed by a tempest. Of this the inhabitants of *Visingsoe*, an island in the middle of the lake, are more sensible than any others; for from that part of the island whence the wind will blow, they hear a confused noise like the firing of cannon, which when heard in the east, is generally followed by hail and rain. All this is doubtless owing to subterraneous winds, and to these, together with those from above, we may attribute the sudden cracking of the ice in
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the spring, which one minute is strong enough to bear horses and sledges, and the next is broken to pieces. A strange noise in the waters, which precedes this sudden eruption, warns travellers to make the best of their way; but those who happen to be at a great distance from land are immediately drowned, or float upon shoals of ice till they meet with relief; and what is still more dangerous, the ice, with the least blast of wind, sometimes sinks to the bottom. The violent under currents observed in this lake are also very surprizing, which directly opposing the winds and waves, give the fishermen a great deal of trouble. From these, as well as from its unfathomable depth, and subterraneous winds, it is supposed to have a communication under ground with another lake called *Venner*, about forty miles to the westward.

Cataracts, as we have already observed, are frequent in the rivers of *Sweden*; but the most famous of these is within a few leagues of *Gottenburg*; where a river, which issues from the lake *Venner*, falls down a prodigious high precipice into a deep pit, with a terrible noise, and with such violence, that large masts which are floated down the river to *Gottenburg*, if they pitch end-ways frequently dive so far under water, that some are said to be half an hour, others three quarters, and some a whole hour or more, before they rise up again to the surface. Many attempts have been made to sound the depth of this hole, with lines of several hundred fathoms, but to no purpose.

The soil of *Sweden*, where capable of cultivation, is tolerably fruitful, though seldom above half a foot deep, and therefore is frequently plowed by a young woman and an ox. Indeed it is generally best where there is least of it, that is, in the little spaces between the rocks; and frequently the barren land being enriched by the ashes of trees burnt on the places where they grow, and the seed raked among the ashes, produces a plentiful crop, without further cultivation. The country does not, however, produce corn sufficient for the support of the inhabitants, who are obliged to have great quantities imported from *Livonia*, and the parts of *Germany* bordering on the *Baltic* sea: and the poor in many places are obliged frequently to live on bread made of the bark of birch-trees, ground and mixed with flour.

As winter in this northern climate commonly begins very early; so it is no sooner ended than it is immediately succeeded by summer, little or no space being left for spring; and the productions of the earth are here more speedy in their growth, than in more southern countries. The heat in summer is said to be sometimes so intense as to set the woods in a flame, which spreads many leagues, and can scarcely be stopt, till it meets with some lake or very large plain; but these conflagrations may probably be occasioned by the carelessness of those who burn the woods, in order to enrich the land with the ashes, and which being now contrary to law, they may perhaps by this pretence screen

themselves from suffering the penalty. During the summer, which lasts but about three months, the fields are cloathed with a variety of flowers, and the whole country overspread with strawberries, raspberries, bilberries, and the like, which grow upon every rock. In their gardens, melons are in dry years brought to perfection; but apricots, peaches, and other wall fruit, are almost as scarce as oranges. They have cherries of several sorts, and some tolerably good, which cannot be said of their apples, pears, and plums, which are neither common nor well tasted: but they have plenty of all kinds of roots, which greatly contribute to the nourishment of the inhabitants.

The sun in the midst of summer is at *Stockholm* eighteen hours and a half above the horizon, and for some weeks affords a continual day. In the middle of winter the days are proportionably short, the sun being up only five hours and a half, but the absence of that great luminary is supplied by the moon, the whiteness of the snow, and the clearness of the sky, so that travelling by night is as usual as by day; and journeys are as frequently begun in the evening as in the morning. The want of the sun's heat is repaired by stoves within doors, and warm furs abroad; instead of which the meaner sort use sheep-skins with the wool on, and other such defences from the weather; and are generally better provided with cloathing suitable to their condition, than the common people in the milder climates of *Europe*. Though when any neglect or failure happens,
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it usually proves fatal, and occasions the loss of the nose, or some other member, and sometimes of life; unless the usual remedy of expelling the frost be applied, when it has seized any part, which is to remain in the cold, and to rub the part affected with snow, till the blood returns to it again.

The cattle, as in other northern countries, are generally small, nor can the breed be improved by bringing in larger from abroad, for they soon degenerate; because, in summer, the grass is much less nourishing, than in the places from whence they came; and in winter they are usually half starved for want of fodder, which often falls so very short, that the people are forced to unthatch the houses to keep their cattle alive. The coarse wool of their sheep is only fit to make cloathing for the peasants: however, their horses, especially those of *Finland*, are hardy, vigorous, strong, sure-footed, and trot nimbly, which is of great use to the people, on account of the length of the winter, and the fitness of these horses for sledges, their only carriages in that season; and the soldiers pretend, that their horses are able to break a body of the best *German* horse.

Bears, elks, deer, and hares are here hunted for their flesh; as are wolves, foxes, wild cats, &c. for their furs and hides. The inhabitants hunt with less ceremony than is used in other places, taking all advantages of shooting their game, at which they are generally very dexterous. They have but few parks, and those meanly stocked, the charge of feeding deer all

winter, exceeding the profit. There are no rabbits here, but what are brought from abroad and kept tame. In winter the foxes and squirrels become grey, and the hares as white as snow.

Wild and tame fowl are very plentiful and good, except such as feed on fish. The most common are keders and orras, the former of the size of a turkey, and the other of a hen; as also partridges, and a bird somewhat resembling them called yerpers. In winter, are taken great numbers of small birds, as black-birds, thrushes, and sydenscwans, the last are of the size of fieldfares, but better meat; they are supposed to come from *Lapland*, and have very beautiful feathers, some of which are tipped with scarlet. They have but few wood-pigeons, on account of the hawks, and have no house-pigeons, except such as are kept tame. Eagles, hawks, and other rapacious fowls abound most in the northern and desert parts.

The many lakes of this country afford a variety of fish, as salmon, pike, trout, perch, tench, eels, and many sorts unknown in other countries, of which the most numerous is the streamling, a fish less than a pilchard, taken in great quantities, salted in barrels, and distributed all over the country. These lakes are also of great use for the convenience of carriage by boats in summer, and in sledges by winter. Besides, in them, and on the sea-coast, are almost innumerable islands of different sizes,

sizes, of which there are in *Sweden* above 6000 that are inhabited : the rest are either bare rocks or covered with woods.

A great part of the country is taken up with woods and forests. The trees, which mostly consist of pines, fir, beech, juniper, birch, alder, and a few oaks, grow in many places almost close together, and lying to rot where they fall, the woods are scarce passable. These, however, afford a plentiful and cheap firing, and being generally very strait and tall, are easily converted into timber.

Of the mines in *Sweden*, there is one of silver, into which the workmen are let down in baskets to the first floor, which is 105 fathoms under ground. The roof is as high as a church, supported by vast arches of oak : thence the descent is by ladders or baskets to the lowest mine, which is above 40 fathoms deeper.

The copper mine is about 80 fathoms deep, and of great extent ; but is subject to damage by the falling in of the roof ; yet that is sometimes recompenced by the abundance of ore yielded by the ruined pillars. The occasion of these falls is ascribed to throwing the earth and stones brought out of the mine upon the ground over it, by which means the pillars become overcharged and give way. The copper annually made out of this mine amounts to the value of about 200,000 *l.* but a fourth part of this copper belongs to the King.

There are great numbers of iron mines and forges, especially in the mountainous parts, where the people have the convenience of wa-

ter-falls to turn their mills. These mines not only supply the country; but there is yearly exported iron to the value of 300,000 *l*.

The inhabitants, from their breathing a healthful, dry, and sharp air, enjoy a vigorous constitution, which being confirmed by a hardy education, coarse diet, and hard lodgings, enables them to endure whatever uneasy circumstances befall them, better than those who are born in a more moderate climate, and are brought up with greater softness and indulgence. Thus they seem better qualified for a life of labour and fatigue, than for the cultivation of the arts.

The nobility for the most part apply themselves to a military life, in which they are more famous for their courage, and enduring hardships, than for their stratagems. They have a graceful deportment, and make the best appearance they are able, endeavouring to gain respect by the extraordinary number of their attendants, the magnificence of their houses, and the richness of their apparel, rather than by the plentifulness of their tables, or other occasions less liable to attract the observation of the public. They seldom or never accept of any employments in the church, or descend to the practice of law or physic, or the exercise of any trade.

The common soldiers endure cold, hunger, long marches, and fatigue to admiration. The peasants, when sober, are very obsequious and respectful; but drink makes them mad and ungovernable. Most of them live in a very poor

condition, and are taught by necessity to practise several arts in a rude manner, as making their shoes, cloaths, the several instruments of husbandry, and other necessaries, which they cannot spare money to buy.

The women while young have generally fair complexions, tolerable features, and are well shaped ; they are fruitful, and seldom fail of having a numerous issue : but they are nowhere made greater drudges ; for the meaner sort, besides the ordinary offices of the sex, are put to plow and thrash out the corn, to row in boats, and to bear burthens at the building of houses, and on other occasions.

Marriages are here entirely governed by the will of the parents, and founded so much upon interest, that the inclination of the parties is little regarded. The nation is not much troubled with the extravagances of lovers, and therefore stealing of matches is scarce heard of in an age ; nor can the church give a licence to marry without the publication of the bans. However, domestic quarrels rarely happen, and more seldom become public, the husbands being as apt to keep the authority in their hands, as the wives by nature, custom or necessity, are inclined to be obedient : divorces and other separations between man and wife seldom happen, except among the inferior sort, when the innocent party is allowed to marry again. Consingermans are not permitted to marry without the King's dispensation, which is rarely refused.

Their wedding entertainments are generally more pompous and expensive than the people
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are able to afford; for the excess of that one day frequently involves them in inconveniences that last many years. This is also observable in their funeral solemnities, which are usually accompanied with more jollity and feasting than is suitable to the occasion. To gain time to prepare for them, they sometimes remove the corpse to a vault within, or adjoining to their churches, where it remains unburied for a considerable time.



C H A P. II.

Of the Cities of Stockholm, Upsal, and Lund; and an Account of the Political Constitution of Sweden.

SWEDEN has but few cities of consequence except *Stockholm*, the capital of the kingdom, situated on the lake *Meller*, near the *Baltic*. The access to it by sea is extremely difficult, from the great number of small islands that lie before the entrance of the harbour, and secure it from any insults on that side. It is neither walled nor fortified by art; for it is strong by nature, having a dangerous sea on one side, and the lake *Meller* on the other, and on the land side are such hills and rocks, that it can only be approached by certain passes, that may be defended by a small force against a numerous army. This city is in a manner the staple of *Sweden*, to which most of the goods
of

of their own growth, as copper, iron, wire, pitch, tar, masts, deals, &c. are brought to be exported. The greatest part of the commodities imported from abroad, come to this port, where the haven, though difficult of entrance is capable of receiving 1000 ships, and those of the largest size lie close to the quay, which is near an *English* mile in length, where they are so secure from the wind, that they need neither anchors nor cables to hold them: however, the harbour is not only blocked up by the ice four or five months in the year; but the different winds necessary to carry a fleet out, require a great deal of time, and there is no tide to help them, so that an enemy might destroy the whole coast, before the *Swedes* could put to sea; on which account the royal navy is always stationed at *Carelskroon*. The city extends over the whole island of *Stockholm*, which is only about a mile and a half in circumference: but the suburbs on the continent, with the buildings on the other islands, render it a considerable place.

Stockholm was about 300 years ago only a barren island, with two or three cottages of fishermen; but upon the building of a castle upon it, to stop the inroads of the *Russians*, and the removal of the court thither, it by degrees surpassed the more ancient cities, and has now all that is necessary to render it one of the finest cities in the north: for besides the island of *Stockholm*, there are five other small islands built upon, and joined to it by bridges; these are *Riddersholm*, *Konningsholm*, *Hoglandsholm*,
Schip-

Schipsholm, and *Ludduggarstrand*, which are frequently considered as part of the city: in the first is the cloister church, as it is called, and several fine gardens. *Hoglandsholm* is the quarter of the mechanics. In *Schipsholm* is the court of admiralty, the arsenal, and magazines of naval stores. *Ladduggarstrand* is covered with pleasure-houses and gardens, and here also is the King's park, menageries, &c. The south suburb on the continent, which is joined to the city by a bridge, has a noble exchange, and contains the houses of the merchants; and the other suburb to the north of the city is joined to it by two bridges.

In the island of *Stockholm*, is the senate-house, the court of chancery, the criminal college, a noble library, and nine churches, built with brick and covered with copper. The senate-house is a very stately pile, and one of the finest edifices in the Kingdom: it is, as it were, but one large pavilion, adorned on the outside with marble statues and columns, and within with pictures and sculptures; especially two large halls where the nobility meet. Next to this palace is that of the Lord High Chancellor; and a little farther are two other palaces belonging to noblemen, all built in the same taste, and covered with copper; as are likewise several other of the houses of the nobility. The bank is also a noble pile of building.

Among the churches, that of *St. Nicholas* is the largest and most magnificent, it being supported by marble pillars, covered with copper, and adorned with a great number of tombs of

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different kinds of marble. The statue of St. George on horseback trampling on a dragon is much admired. This is the history of his delivering *Cleodolinda*, daughter of the King of *Lydia*, and twelve other devoted virgins, from the fury of the dragon; and *Cleodolinda* is seen kneeling, with her hands lifted up, returning thanks to their preserver. Over the altar is a cabinet finely gilt, on which is a table of a pyramidal form, with five shelves of massy silver, wherein are the following histories in basso relievo: on the first is the nativity of *Christ*: on the second, his last supper: on the third, his crucifix: on the fourth, his burial; and on the fifth, his resurrection. These are all of silver, and on the top is a small statue of the same metal, about two feet high representing the ascension. There are other silver statues of the same height accompanying them, as that of *Moses* with the two tables, *John* the Baptist with a cross and lamb, and the Evangelists with the animals usually assigned them by statuaries and painters, all of massy silver, weighing together about 30,000 ounces. On the right side of the altar is a large picture of paradise and hell, reaching from the pavement to the roof; and on the left side of the altar is painted the crucifixion. This church is very rich in plate, and has particularly a cup of beaten gold embellished with jewels, which, according to Mr. *Mottraye*, is worth no less than 40,000 crowns. The other churches do not appear to have any thing remarkable; only they are generally covered with copper, have very lofty spires, and
instead

instead of bells have very musical chimes in their steeples, which play upon festivals, and other solemn occasions.

The city on one side affords a prospect over the lake, and on the other over the harbour, which being almost enclosed by rocks, resembles another lake, the water of which is so little brackish that it may be drank, which is owing to the great quantity of fresh water that runs into it from the lake.

Most of the burghers houses are built with brick, except in the suburbs, where they are of timber, and are therefore in danger of fire, which when it once gets a-head, destroys all before it. They sometimes send the dimensions of the house they intend to build to *Finland*; where the walls and several separations are built of pieces of timber laid one upon another, and joined at the corners; and afterwards marked, taken down, and sent by water to *Stockholm*, there to be set up and finished; and when they are kept in good repair they are warmer, cleaner, and more healthful than those of either brick or stone.

The next city we shall mention is *Upsal*, which is situated on the river *Sala*, 42 miles to the north-west of *Stockholm*. 'Tis a very ancient city, and was formerly the capital of the north, and the seat of the King. 'Tis still an university, and the see of an Archbishop. It is divided into two parts by the river, which is here pretty broad, and so hard frozen up in *February*, that a fair is annually kept upon it. The town is large, but without any considerable

nable fortifications: however, on a steep hill above the city is a beautiful castle, built after the *Italian* manner, that has a noble prospect over the city, which it commands, and of the whole country.

The buildings of the city are generally of wood, except the palace of the Archbishop, and the houses of some of the principal citizens, which are of brick. Travellers usually take notice of the cathedral, the library, and physic garden, as most worthy of observation. The cathedral is a fine piece of *Gothic* architecture, 747 feet long; 140 broad, and 230 feet high from the pavement to the vaulted roof, which is covered with copper; this is esteemed the finest church in the whole kingdom. Here are the tombs of many of the Kings and Queens of *Sweden*, several of which are adorned with statues of white marble.

Lunden was formerly a considerable city in which was 22 churches, and an university that has been suppressed. It is but a few miles distance from the sea-shore, and stands opposite to *Copenhagen*, from which it is about 24 miles distant to the east. The cathedral of *St. Lawrence* is a magnificent structure with a high spire, which serves the sailors for a landmark: The altar is very beautiful; but what most engages the attention of strangers is its curious clock, which not only shews the hour, day, month and year, together with all the festivals in the year; but every hour two horsemen come forth, and encounter each other, giving so many blows as the hammer strikes

upon the bell : then a door opens, discovering the *Virgin Mary* sitting on a throne, with *Christ* in her arms, and the wise men paying their homage to him, two trumpeters sounding all the while.

There are a few other cities in this kingdom, but we do not find they contain any thing very extraordinary, and worthy the notice of the curious reader.

The crown of *Sweden* was anciently elective; but the great *Gustavas I.* who ascended the throne in 1523, and introduced the reformation, rendered it hereditary : *Charles XI.* made *Sweden* an absolute monarchy, and his son *Charles XII.* strained his authority to the highest degree of despotic power : but upon his death, an immediate change was made in the government, and on the accession of his sister *Ulrica Eleonora*, in 1718, to the crown, she renounced all absolute and despotic power, and the government was restored to its ancient form. In 1720, at her desire, her husband, the Prince of *Hesse*, was elected King; and at his death, the present King was raised to the throne; but the power of the sovereign of *Sweden* is in many respects as limited as that of a Doge of *Venice*; for he has scarcely any of the prerogatives of royalty. The states of the Kingdom, who concur in the making of laws, are composed of the deputies from the nobility, the clergy, the burghers, and the peasants: the concurrence of these seem indeed necessary to the preservation of the liberties of the people; and

not

not inconsistent with the just rights of the monarch : but the King is also obliged to submit to the determinations of the senate, who have not only authority to give their advice in all affairs of importance ; but in some cases to admonish, and even over-rule him, who is not at liberty to transact any business of consequence, without the concurrence of the majority of them. They are indeed chosen by the King ; but their oath rather expresses their fidelity to the kingdom than to the King. Their office is for life, and as the people look upon them the protectors of the liberty and privileges of the nation, the sovereign power and majesty of the state is properly lodged in that body ; both war and peace depend on them, and therefore not only attempts upon their persons, but defaming them is accounted treason.

The laws of *Sweden* are reduced to a small compass, and compiled into a body : hence the expence of law-suits are extremely moderate. Titles to estates are here rendered secure by the registers that are kept of all sales and alterations ; the purchaser running the hazard of having an after-bargain take place of his, if he omits recording his transaction in the proper court. Treason, murder, adultery, burning of houses, and the like heinous crimes are punished with death ; but the punishment of robbery and stealing is perpetual slavery. The criminal is condemned to work all his life for the King, at the fortifications or other drudgery, and has always an iron collar about his

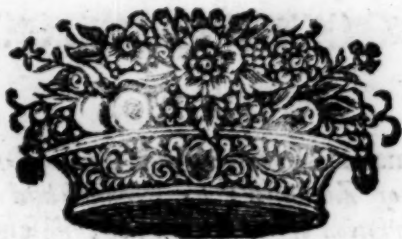
neck, with a bow coming over his head, to which a bell is fastened, that rings as he goes along.

If a party be killed in a duel, the survivor is punished with death, and the memory of both is rendered infamous. If neither be killed, they are both imprisoned for two years, and obliged to live on bread and water: they are also fined 1000 crowns; or one years imprisonment and 2000 crowns. On the other hand, reparation of honour, in case of an affront, is referred to the national court, where recantation, and public begging of pardon is usually inflicted.

The *Lutheran* religion has been established in *Sweden* ever since the reformation; and no other is tolerated. All orders of men agree in a constant attendance on divine service without any nice enquiries into disputable points, either of their own tenets, or those of other religions. The church is governed by one Archbishop, and ten Bishops, whose revenues are very moderate. There are two universities, one at *Upsal*, and the other at *Abo*, a town in *Finland*. In the former, which is the principal, the ordinary number of students amount to about 7 or 800, fifty of whom are maintained by the King; and a few others were formerly supported by the nobility; but those in both universities who cannot subsist of themselves, spend the vacation in begging charity in the diocese to which they belong, and usually receive corn, butter, dried fish,

or

or flesh, upon which they subsist at the university the rest of the year. In each diocese there is a free-school, where boys are fitted for the university, and other schools to which children are sent to learn to read, write, and sing their prayers; and few want this degree of education.

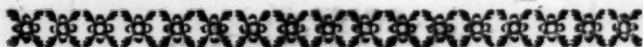




AN
ACCOUNT
OF
DENMARK,

BY

The LORD MOLESWORTH.*



CHAP. I.

*Of Denmark in general, and particularly of the
Island of Zealand; its Produce and Climate:
A Description of Copenhagen, Elsenour, and
Fredericksburg; the Peninsula of Jutland, the
Castle of Gottorp, and the Island of Funen.*

THE country properly called *Denmark*,
consists of *Jutland*, part of the dutchy
of *Sleswick*, and several islands in the *Baltic*

* We have omitted in the account given by this
great author, whatever appears to be dictated by
partiality, and have improved this article, with the
observations of later writers, which as usual we
have distinguished by inclosing them in crotchets.

See.

sea. The peninsula of *Jutland* is the largest and most fertile of the countries included under the name of *Denmark*; but the islands are more considerable on account of their situation, especially *Zealand*; because it contains *Copenhagen*, the capital of *Denmark*, and the famous passage of the *Sound* is bordered by its shore, where on the narrowest part stands the town of *Elseneur*.

Zealand is almost of a circular figure, and about 180 *English* miles in circumference; but it produces no bread-corn, except rye, of which most of their bread is made. It has few meadows, and has no want of good hay; though most of the grass, which is short and sweet, grows by the sides of the corn fields, or in some marshy spots of ground. It has no rivers, nor above half a score brooks able to turn a mill: but there are a great number of fine lakes sufficiently stored with fish. The air is but indifferent, especially at *Copenhagen*; which is occasioned by its low situation and frequent fogs. The inhabitants burn beach-wood for their firing, which is the only sort of timber trees that abound in the island. About one 4th part of it is forest, lying open for the King's hunting and game, as stags, wild boars, and roe-bucks, which are held so sacred, that nobody dares touch them, though they find them in whole herds destroying their corn.

The face of the land is agreeably diversified with little hills, woods, and lakes. The cattle are generally small and lean, and are kept within doors seven or eight months in the year; where

where they are fed partly with hay, and partly with brewers grains, roots, weeds, and such trash as their owners can provide for them: but in summer time their beef is sweet and juicy.

Throughout all *Denmark* there are but two seasons in the year, winter and summer, the more agreeable ones of spring and autumn not being commonly known; the spring never, and the autumn seldom; the transitions from cold to heat, and from heat to cold being extremely sudden. During the months of *June*, *July*, and *August*, the weather is much warmer than in *England*, and very sultry in the nights; but it is a gloomy heat, and in the day time people generally perceive some interposition of thick vapours between them and the sun. In *Copenhagen*, during these three months, they are constantly troubled with the plague of flies, which they endeavour to destroy by a poisoned water; upon the sprinkling of which in their kitchens and chambers, I have seen whole bushels of dead flies swept together in one room.

The only city worthy of notice in this island, and indeed of all *Denmark*, is the city of *Copenhagen*, there being no other in the King's whole dominions much better than our town of *St. Alban's*. *Copenhagen* is neither a very ancient, nor a very large place; it approaching nearest to *Bristol*, of any of our *English* cities: but its excellent port, renders its situation for trade one of the best in the world. It is surrounded with fortifications, and the port is inclosed by
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the bulwarks of the town, the entrance being so narrow, that but one ship can pass at a time; and this entrance is every night shut up with a strong boom: the citadel on one side, and on the other a good block-house well furnished with cannon, command the mouth. Within this haven rides the royal navy, every ship having her place assigned her; a wooden gallery ranges round the whole inclosure where the fleet lies, and extending over the water, the ships may be viewed from it in as easy and commodious a manner as if they lay on dry land. This harbour is capacious enough to hold 500 sail, out of the reach of storms and tempests. [But it has been found that their fortifications cannot protect them from a bombardment at sea, nor are they always secure on that side against the attacks of a land army; for the *Baltic* has been so hard frozen, that the *Swedes* have drawn their artillery over the ice, and laid siege to the city.] The buildings of *Copenhagen* are generally very mean, they being formed of a kind of cage-work, with the intervals between the timbers filled up with brick. The public edifices, and particularly the palace formerly made a very indifferent appearance; and several of the noblemen were infinitely better lodged than the royal family. [But on the 28th of *October*, 1728, the city was reduced to ashes, and this conflagration has contributed greatly to its beauty; for it rose again in a more magnificent form; the houses were built with brick and free-stone, and the King has erected a very noble palace. The royal museum here contains

tains an admirable collection of curiosities both natural and artificial, preserved in eight chambers over the royal library, which is large and well furnished. One of these rooms is wholly taken up with medals, which are very judiciously arranged. Among the natural curiosities, one of the most remarkable is a petrified child, which was cut out of the mother's belly at the city of *Sens* in *France* in the year 1582, after having lain there between 20 and 30 years. This foetus was first carried to *Paris*, where it was sold to a jeweller of *Venice*, who happened to be there, for about 20 *l.* sterling; of whom it was afterwards purchased by *Frederic III.* King of *Denmark* for 60 *l.* and added to this collection. That it is not artificial is evident beyond all dispute. Its head, shoulders and belly are of a whitish colour, and nearly resemble alabaster; the back and loins are hard and brown; but from the hips downward it is of a red colour, and perfect stone, exactly resembling the hard sort generated in the bladder.

In this fine collection are several large pieces of silver ore, dug out of the mines of *Norway* in 1666, one of which weighs 560 pounds, and is valued at 5000 crowns: another piece is valued at above 3000; both being supposed to contain at least three parts silver. They are composed of a whitish stone, the cavities of which seem to be filled with pure virgin silver. In some places lying in broad flat plates, and in others like pieces of fine silver lace: but what are most admired, are the threads or branches

branches of silver which shoot out an inch or two beyond the stone, in the form of small shrubs or bushes. Here are also several large pieces of amber, some weighing 40 or 50 ounces; which upon opening the ditches about *Copenhagen*, were found sticking to the sides of old trees that were buried there, like the gum on the plum-trees in our gardens.

Among the artificial curiosities, is a skeleton of ivory, two feet six inches high, so nicely formed that it is scarcely to be distinguished from a natural one. Another piece of ivory contains the history of our Saviour's passion, beautifully expressed in relievo. There is likewise a small man of war in ivory, with silver guns, which is much admired, as is also a watch made of ivory. There are besides many other curiosities in ivory, ebony, box, amber, and other materials, kept for the sake of the elegance or minuteness of the workmanship, and it is said there is a common cherry-stone on the surface of which are engraven 220 heads; but their smallness makes them appear imperfect and confused.

The sciences now begin to flourish at *Copenhagen*; learning is encouraged and makes great advances, and that city has a royal academy of sciences, which nearly resembles the Royal Society of *London*.

The houses of *Copenhagen*, do not take up above half the ground inclosed by the fortifications. The isle of *Amack*, which is separated from the city only by a small channel of the sea, is united to it by several bridges, that afford

afford an easy communication; and in this island is what is called the New Town, which consists of about 4 or 500 houses, and contains the arsenal, the mint, the exchange, and the castle. This little island, which is only about six miles in length, is called the garden of *Copenhagen*, and is esteemed the most fertile spot in *Denmark*.] It was given long ago to several families who came from North *Holland*, to make butter and cheese for the court, and their descendants still retain the habit, language, and customs of their predecessors, together with their cleanliness and industry; for they will not mix with the *Danes*, but intermarry with each other. This island, through the industry of these laborious people, plentifully supplies the markets of *Copenhagen* with all sorts of roots and herbs; besides butter, milk, great quantities of corn, and some hay.

[*Elseneur*, is about twenty miles north of *Copenhagen*, and is defended by the neighbouring castle of *Cronenburg*, which commands that side of the *Sound*, as *Helsingburg* does the other. Every ship that passes this streight must strike sail at *Cronenburg*, and steer to the town, to compound for the custom, under the penalty of forfeiting the vessel and cargo. The castle of *Cronenburg* is 4 or 500 paces distant from *Elseneur*, and is built on oaken piles, in so solid a manner, that it is able to support the fury of the tide, which sometimes beats against it with great violence. It forms a large square court, and was adorned with fine statues: the

apart-

apartments were also very splendid: it is even pretended that not only the locks of the doors, but the very pipes of the cistern that supplied the garrison with water, were all of silver, before it was plundered by the *Swedes*. This, however, is very improbable, and is doubtless no more than a vulgar error. It has four little towers at each corner, covered with copper; but the castle, with the chapel, steeple, and ornaments are all going to decay. The land-side is secured by five bastions and a half.

Fredericksburg is a small town 20 miles to the north-west of *Copenhagen*, and 18 to the south-west of *Elseneur*. This place is famous for the fine palace that stands near it, which is called the most beautiful and delightful of any belonging to the King, and is generally called the *Versailles* of *Denmark*. This palace stands on an island in the midst of a small lake. Here was formerly the seat of a private gentleman; but King *Frederic II.* being charmed with its situation, bought it, and began to erect the palace, which was finished by his son *Christiern IV.* This structure stands on piles, and consists of a very magnificent front, with two large wings, that contain several grand apartments. The gallery that leads to the hall of audience is adorned with a fine collection of paintings, most of them brought from *Italy*; and the hall is hung with the pictures of several of the *Danish* Kings, and of the present royal family, as large as the life. The exploits of some of these monarchs are also beautifully painted in different parts of the palace, and the great ac-

tions of *Christiern IV.* are represented in rich tapestry. The chapel is covered with gilt copper, and on the inside embellished with paintings and other ornaments, among which are the statues of the twelve Apostles in silver; and it is said the locks, bolts, &c. were of silver, before it was plundered by the *Swedes*. There is a fine garden behind the palace, and in the lake is a kind of terrace, raised on piles, which cost 100,000 crowns. The neighbouring park is about nine miles long, interspersed with canals and fish-ponds, and agreeably diversified with a mixture of grass-plats, little hills, and valleys, well stocked with fallow-deer from *England*.]

The peninsula of *Jutland*, part of the *Cimbrica Chersonesus*, composes the largest part of the kingdom of *Denmark*. The soil of North *Jutland*, which alone is included in that kingdom, is not very fertile; but abounds in cattle, great numbers of which are purchased by the *Dutch*, when very lean, and transported to their own more fertile soil, where they soon grow exceeding fat. The swine of this country are excellent and very numerous. *Jutland* affords corn sufficient for the support of the inhabitants. The most fertile lands lie near the sea-coasts, the inland parts being full of heaths, lakes, and woods. The whole country is divided into four bishoprics; but the cities and towns make but an indifferent figure.

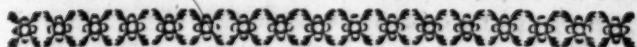
[South *Jutland*, usually called *Sleswic*, is the most fertile, but the Duke of *Holstein* has the joint dominion of a part of this country, and

and in some great towns and territories each has a distinct dominion. The Duke of *Holstein*'s capital is *Gottorp*; and though it is not subject to the crown of *Denmark*, it may not be improper to give here a description of the gardens belonging to the castle, which is not only a fortress, but one of the noblest palaces in these northern countries.

The castle of *Gottorp* stands on the west of the river *Sley* in the midst of a small lake, and is built in the form of an oblong square. A rampart encompasses the first court, and the gate of the castle is of a fine blue stone as hard as marble. On the north side of this structure is a bridge over the lake, 200 paces in length, at the end of which a pleasant walk between rows of trees leads to a fine garden adorned with cascades, fountains, and other water-works. Particularly in a large basin, is a statue of *Hercules* combating the *Hydra*, whose seven heads spout water. On the north is a parterre in the form of a crescent, divided into compartments, and embellished with the busts of several Kings and Princes. But one of the most curious ornaments of these gardens is a fine copper globe, ten feet and a half in diameter, with a sphere, exhibiting the motion of the sun and heavenly bodies, which are carried round in exact order, by means of certain wheels turned by water. Before the house is a level piece of ground about 150 paces long, divided into three parts, those on the sides being two fine parterres, and that in the middle having a large basin in the centre with fine

water-works. From thence you ascend to different terraces, one above another, set round with statues, busts and other ornaments. The highest terrace exhibits a most delightful prospect of the castle, the surrounding lake, and a fine country; and on the other hand, of a noble orangery, and of the neighbouring park, which is four or five miles in circumference, and well stocked with deer.]

Among the islands included under the name of *Denmark*, is *Funen*, which is about 36 miles from east to west, and 30 from north to south. The soil is here fertile and well manured, and the country consists of small fruitful hills, some of them well covered with woods. It is better peopled than *Zealand*. Much corn, and great herds of black cattle are exported from thence, and the inhabitants have a good breed of horses, and plenty of hogs. This island is the appenage of the King's eldest son, and the government of it is one of the most considerable in the kingdom. There are several lesser islands comprehended under the kingdom of *Denmark*. But the most extensive part of this Prince's dominions is *Norway*, of which we shall hereafter give a particular description.



C H A P. II.

The Manner in which the Danes made a voluntary Surrender of their Liberty. Of the King's Court, the Laws of Denmark, and the Customs and Manners of the People.

DE N M A R K was till lately governed by a King chosen by the people of all ranks; but in their choice, they paid a due regard to the family of the preceeding Prince, and if they found one of his line qualified for that high honour, they thought it just to prefer him before any other, and were pleased when they had reason to chuse the eldest son of their former King: but if those of the royal family were deficient in abilities, or had rendered themselves unworthy by their vices, they chose some other person, and sometimes a private man to that high dignity.

Frequent meetings of the states was a fundamental part of the constitution: in those meetings every thing relating to the government was transacted; good laws were enacted, and all affairs relating to peace and war, the disposal of great offices, and contracts of marriage for the royal family, were debated. The imposing of taxes was purely accidental, no money being levied on the people except to maintain a necessary war with the advice and con-

sent of the nation, or now and then by way of free-gift, to add to a daughter's portion: the King's ordinary revenue consisting only in the rents of his lands and demesnes, in his herds of cattle, his forests, services of tenants in cultivating his ground, &c. for customs on merchandize were not then known in that part of the world: so that he lived like one of our modern noblemen, upon the revenues of his estate. It was his business to see justice impartially administered; to watch over the welfare of his people, to command their armies in person; to encourage industry, arts, and learning; and it was equally his duty and interest to keep fair with the nobility and gentry, and to be careful of the plenty and prosperity of the commons.

But in 1660, the three states, that is, the nobility, clergy and commonalty being assembled in order to pay and disband the troops which had been employed against the *Swedes*, the nobility endeavoured to lay the whole burthen on the commons, while the latter, who had defended their country, their Prince, and the nobility themselves with the utmost bravery, insisted that the nobles, who enjoyed all the lands, should at least pay their share of the taxes, since they had suffered less in the common calamity, and done less to prevent its progress.

At this the nobility were enraged, and many bitter replies passed on both sides. At length the principal Senator standing up, told the President of the city that the commons neither
under-

understood the privileges of the nobility, nor considered, that they themselves were no other than slaves. The word Slaves was followed by a loud murmur from the clergy and burghers: *Nanfon*, the President of the city of *Copenhagen*, and speaker of the house of commons, perceiving the general indignation it occasioned, instantly arose, and swearing that the commons were no slaves, which the nobility should soon prove to their cost, walked out, followed by the clergy and burghers, and proceeding to the brewers-hall, debated there on the most effectual means of humbling the insupportable pride of the nobles.

The next morning the commons and clergy marched in great order to the council-house, where the nobles were again assembled, and the President *Nanfon* made a short speech, observing that they had considered the state of the nation, and found that the only way to remedy the disorders of the state was to add to the power of the King, and render his crown hereditary, in which if they thought fit to concur they were ready to accompany them to the King, whom they had informed of their resolution, and who expected them in the hall of his palace.

The suddenness of this proposal, and the resolution with which it was made, caused a general consternation among the nobles. They now endeavoured to sooth the commons by fair speeches; and urged that so important an affair should be managed with due solemnity, and that it should be regulated in such a manner

ner that it might not have the appearance of a tumult. To this the President replied, that they only wanted to gain time, in order to frustrate the intentions of the commons; who came not thither to consult, but to act. After farther debate, the commons growing impatient, the clergy and burghers, led on by their Bishop and President, proceeded without them to the palace; and were met by the prime minister, who conducted them to the hall of audience, whither the King soon came to them. The Bishop made a long speech in praise of his Majesty, and concluded with offering him an hereditary and absolute dominion. The King returned them his thanks; but observed that the concurrence of the nobles was necessary; he assured them of his protection, and promised to ease their grievances. The nobles were all this while in the greatest distraction; they could come to no resolution, and broke up in order to attend the funeral of a principal Senator; but while they were at a magnificent dinner, which was usually provided on such occasions, they were told that the city gates were shut by the King's orders, and the keys carried to court. They were now filled with the apprehensions of being all massacred, and the dread of losing their lives took away all thoughts of their liberty: they therefore immediately dispatched messengers both to the court and to the commons, to give notice of their compliance. But the King being resolved to pursue the affair to the utmost, would not suffer the gates to be opened till the whole ceremony

remony of the inauguration was concluded. Three days time were necessary to prepare matters for the fatal hour in which they were to make a formal surrender of their liberty. Scaffolds covered with tapestry were erected in the square before the castle : orders were given for the soldiers and burghers to appear in arms under their respective officers; and on the 27th of *October* in the morning, the King, Queen, and Royal Family being mounted on a theatre erected for that purpose, and placed in chairs of state under canopies of velvet, received publicly the homage of all the senators, nobility, clergy, and commons, which was performed on their knees, each taking an oath faithfully to promote his Majesty's interest in all things, and to serve him faithfully as became hereditary subjects. Here one *Gersdorf*, a principal Senator, was the only man who opened his mouth in behalf of their expiring liberties, saying, that he hoped and trusted that his Majesty designed nothing but the good of his people, and not to govern them after the *Turkish* manner; but wished his successors might follow the example his Majesty would undoubtedly set them, and make use of that unlimited power for the good, and not the prejudice of his subjects. Not one of the rest spoke a word, or seemed in the least to murmur at what was done. Those who had paid their homage now retired to the council-house, where the nobles were called over by name, and ordered to subscribe the oath they had taken, which they all did.

Thus

Thus in four days time the Kingdom of *Denmark* was changed from a state but little different from that of aristocracy to that of an unlimited monarchy. The only comfort the commons had left, was to see their former oppressors almost as much humbled as themselves; while all the citizens of *Copenhagen* have obtained by it is, the insignificant privilege of wearing swords: so that now not a cobbler nor a barber stirs abroad without one by his side. The clergy were indeed the only gainers; for they reaped many advantages from this change.

However, no ensigns of majesty appear at the court of *Denmark*, except such as are military, as horse and foot guards, yeomen, and the sound of drums and trumpets; but the badges of peace, as heralds, maces, the chancellor's purse, and the sword of state are here unknown. The King sits down to dinner with his Queen, children, relations, and general officers of the army, till the round table be filled. The court-marshal inviting sometimes one and sometimes another to eat with his Majesty till all have had their turns in that honour. A page in livery says grace before and after meat; for no chaplain appears here but in the pulpit. The attendants are one or two gentlemen, and the rest livery servants. The kettle drums and trumpets which are ranged before the palace, proclaim aloud the very minute when the King sits down to table; but the ceremony of the knee is not used to his Majesty.

Every

Every winter, the snow is no sooner firm enough to bear, than the *Danes* take great delight in going in sledges. The King and court first giving the example, and making several tours about the capital in great pomp, with kettle drums and trumpets; their sledges drawn by horses adorned with rich trappings, and harness full of small bells. After the court has thus opened the way, the burghers and others ride about the streets all night, wrapped up in their furr gowns, with each his female in the sledge with him.

What is most admirable with respect to *Denmark* are its laws, which are founded on equity, and are remarkable for their justice, perspicuity, and brevity. These are contained in one quarto volume wrote in the language of the country with such plainness, that every man who can read is capable of understanding his own case, and pleading it too, if he pleases, without the assistance of either an attorney, or of counsel.

The common people in general, throughout all *Denmark* live very mean; the food of the burghers and citizens being rye-bread, salt-fish, stock-fish, excellent bacon, and very bad cheese; and the peasants live on roots, white meats, and rye-bread; seldom tasting fresh fish, and scarce ever flesh, unless on some extraordinary festivals, as on *St. Martin's* eve, when each family in *Denmark* never fails to make merry, and to have a roasted goose for supper. However, the tables of the rich are usually well furnished; but the meat is generally lean.

Wea-

Weather mutton is very scarce and seldom good. Here are no pheasants, woodcocks, rabbits, or fallow-deer; but you may sometimes meet with a small roe-buck in the market; but it is also generally lean: the hares are however good. Sea fish is scarce, and not good; but the river fish makes amends, here being most excellent carp, perch, and craw-fish. One cannot expect extraordinary fruit so far north, yet the gentry do not want such as are very tolerable; and some of the nobility have melons, grapes, peaches, and all sorts of fallads very early, and in great perfection.

The people are fond of drinking; the liquors that are most in vogue with the great are *Rhenish* wine, cherry-brandy, and all sorts of *French* wine. The poor people who are able to indulge themselves, do it in bad beer, and *Danish* brandy.

The gentlemen and officers dress very splendidly after the *French* mode; but the winter dress of the ladies, which is *Danish*, is very convenient and becoming. The burghers, the servants, and even the peasants are neat and cleanly; they love change of their ordinary white linen, which is here made cheap: the women employing their leisure hours in spinning.

They are sometimes contracted three, four or more years before marriage. The gentry give portions with their daughters; but the burghers and peasants only give cloaths, household goods, and a great wedding dinner; which are all they part with till their death. Magnificent

nificent burials and monuments are much in request with the nobility; and it is usual to keep the body of a person of quality in a vault, or the chancel of some church, for several years together, till they have an opportunity to celebrate the funeral. The poorer sort are buried in great thick chests; and in the towns there are about a dozen common mourners belonging to each parish, who are obliged to carry, and attend them to their graves.

It is difficult for strangers to find conveniences of lodging or eating in *Denmark*; even in *Copenhagen* there are few or no lodgings to be lett in private houses; and in the taverns people must be content to eat and drink in a public room, into which any other company may enter, and eat at another table: unless a person pretends to higher matters than ordinary.





THE
NATURAL HISTORY

OF

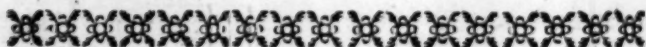
N O R W A Y,

BY

ERICH PONTOPPIDON,

died about 1750

Bishop of Bergen, and Member of the Royal
Academy of Sciences at Copenhagen.



C H A P. I.

*Of the Climate and Mountains, with what they
contain, particularly of the different Kinds of
Marble, and an Account of the Asbestos, or Stone-
flax: The Vegetables, and Animals of Norway.*

THE climate of Norway is much more
various than in most other European coun-
tries, it extending 300 Norway miles * from

* The common miles of Norway are computed
to be about one fourth larger than a German mile,
or nearly equal to five or six English miles.

Cape

Cape *Lindesnaes* in the south, to the north cape on the borders of *Russia*. In the summer nights the horizon, when unclouded, is so clear and luminous, that at midnight one may read, write, and do all kinds of work as in the day, and in the extremity of this country towards the islands of *Finmark*, the sun is continually in view in the midst of summer; and is observed to circulate day and night round the north pole; contracting its orbit, and then gradually enlarging it, till at length it leaves the horizon. On the other hand, in the depth of winter the sun is invisible for some weeks; all the light perceived at noon being a faint glimmering of about an hour and a half's continuance; which, as the sun never appears above the horizon, chiefly proceeds from the reflexion of the rays on the highest mountains, whose summits are seen more clearly than any other objects; but the wise and bountiful Creator has granted the inhabitants all possible assistance; for besides the moon-shine, which by reflexion from the mountains is exceeding bright in the valleys, the people receive considerable relief from the *Aurora Borealis*, or northern lights, which often afford them all the light necessary to their ordinary labours.

On the east side of *Norway*, the cold of winter generally sets in about the middle of *October*, and lasts till the middle of *April*. The waters are congealed to a thick ice, and the mountains and valleys covered with snow. However, this is of such importance to the

welfare of the country, that in a mild winter, the peasants who live among the mountains, are considerable sufferers; for without this severe frost and snow, they can neither convey the timber they have felled to the rivers, nor carry their corn, butter, furs, and other commodities, in their sledges, to the market-towns, and after the sale of them carry back the necessaries they are there supplied with. For the largest rivers, with their roaring cataracts, are arrested in their course by the frost, and the very spittle is no sooner out of the mouth, than it is congealed, and rolls along the ground like hail. But the wise Creator has given the inhabitants of this cold climate a greater variety of preservatives against the weather, than most countries afford. Extensive forests supply them with plenty of timber for building, and for fuel: the wool of the sheep, and the furs and skins of wild beasts, furnish them with warm lining for their cloaths, and covering for their beds: innumerable flights of wild fowl supply them with down and feathers: the mountains themselves serve them for fences against the north and east winds, and their caverns afford them shelter.

But while the winter rages thus in the east of *Norway*, the lakes and bays on the west side are kept open by the warm exhalations of the ocean, though lying in a direct line with these frozen eastern parts; and the frosts are seldom known to last above a fortnight or 3 weeks. Even in the centre of *Germany* which is 200 leagues nearer the line, the winters are generally more severe, and the frosts sharper than in the diocese

case of *Bergen*, for here the inhabitants often wonder to read in the public papers, of frost and snow in *Poland* and *Germany*, when they feel no such weather. The harbours of *Amsterdam*, *Hamburg*, *Copenhagen*, and *Lubeck* are frozen ten times oftener than ours; for with us this seldom happens above two or three times in a whole century. Thus our winter at *Bergen* is so moderate that the seas are always open to the fishermen and mariners, and here the north sea continues navigable during the whole winter as far as the 80th or 82d degree.

In the summer months the weather is not only warm but very hot. These violent heats, which are, however, of short duration, may be partly derived from the valleys inclosed within high mountains, where the reverberation of the rays of the sun on all sides heat the air; and as there is almost no night, neither the atmosphere nor the mountains have time to cool. Indeed there cannot be a more decisive proof of the summer's heat in *Norway*, than that several vegetables, (and particularly barley) grow up and ripen within six weeks or two months.

The air is pure and salubrious, especially in the middle of the country about the mountains, where the inhabitants know little of sickness. Physicians are only to be found in the chief towns, where they are established with a public salary; but have generally very little employment. However, *Bergen* and all the eastern coast, is so subject to frequent rains, that the women, when they go abroad, in all weathers

wear a woollen or filken black veil over their heads, while the men secure themselves by wearing rain-hats, made like umbrellas.

Norway contains a vast number of mountains, some of which extend themselves in a long chain from north to south, while others are scattered about and surrounded by a level country. The chain already mentioned is said to equal at least the *Alps* in height; and abounds with frightful caverns of an amazing extent. Hearing at the parsonage of *Oerfkoug*, that from the side of a neighbouring mountain called *Limer* issued a stream, over which was a cavern, I resolved to take a view of it, and furnished myself with a tinder-box, candles, a lanthorn, and a long line to serve me as a clue to find the way out. The ascent to it being extremely steep, we were obliged to climb with our hands as well as feet, and sometimes were hard put to it to clear our way through the bushes. After getting through the thicket which almost hides the mouth of the cavern, I beheld a vaulted passage of pure marble without the least flaw, but with several angles and protuberances so bright as to resemble a paste moulded into smooth globular forms. The passage continues about 100 paces in a strait direction; then winds off to the right with ascents and descents; in some places growing narrower, and in others widening to double its former breadth, which was about four or five ells: thus two persons might go abreast, only we were now and then obliged to stoop and even creep, when we felt a damp vapour like that
of

of a vault for the dead, which prevented my going so far as I intended. Another thing remarkable was the terrible roaring of the waters under us, the course of which was what most excited my wonder, as over it lies a pavement of smooth stone, inclining a little on each side, but flat in the middle, and not above three fingers thick, with some crevices, through which the water may be seen.

The inhabitants of a mountainous country may be said to labour under more inconveniences than others. Thus the arable ground is here but little in comparison with the wastes and deserts, which obliges the inhabitants to procure half of their subsistence from the sea: the villages are small, and the houses scattered among the valleys: but in some places the peasants houses stand so high, and on the edge of steep precipices, that ladders are fixed to climb up to them; so that when a clergy man is sent for, who is unpractised in the road, he risks his life in ascending them, especially in winter, when the ways are slippery. In such places the bodies of the dead must be let down with ropes, or be brought on men's backs before they are laid in a coffin, and, at some distance from *Bergen*, the mail must likewise in winter be drawn over the steepest mountains.

One of the principal inconveniences, especially to travellers, arises from the roads; who cannot without terror pass several places, even in the King's road over the sides of steep and craggy mountains; on ways that are either
shored

shored up, or suspended by iron bolts fixed in the mountains, and though not above the breadth of a foot path, have no rails on the side. If two travellers were to meet there in the night, and not see each other soon enough to stop where the road will suffer them to pass, it appears to me, as it does to others whom I have asked, that they must stop short, without being able to pass by each other, or to find a turning for their horses, or even to alight. The only resource I can imagine in this difficulty is, that one must endeavour to cling to some cliff of this steep mountain, or if help be at hand, be drawn up by a rope, and then throw his horse headlong down a tremendous precipice, in order to make room for the other traveller to pass.

Another evil resulting from the mountains, is the shelter they afford in their caverns and clefts to the wild beasts, which render it difficult to extirpate them. It is not easy to describe the havock made by the lynxes, foxes, bears, and especially wolves, among the cattle, goats, hares, and other useful animals.

Another evil is that the cows, sheep, and goats belonging to the peasants often fall down the precipices and are destroyed. Sometimes they make a false step into a projection called a mountain-hammer, where they can neither ascend nor descend: on this occasion a peasant cheerfully ventures his life for a sheep or a goat; and descending from the top of a mountain by a rope of some hundred fathoms in length, he
flings

flings his body on a cross stick, till he can set his foot on the place where his goat is ; when he fastens it to the rope to be drawn up along with himself. But the most amazing circumstance is, he runs this risk with the help of only a single person, who holds the end of the rope, or fastens it to a stone, if there be one at hand. There are instances of the assistant himself having been dragged down, and sacrificing his life from fidelity to his friend, on which both have perished. On these melancholy accidents, when man or beast falls some hundred fathoms down the precipices, it is observed that the air presses with such force against their bodies thus falling, that they are not only deprived of life long before they reach the ground, but their bellies burst, and their entrails gush out ; which is plainly the case when they fall into deep water.

On the other hand, a great chain of these mountains serve as a barrier between *Norway* and *Sweden* ; and are excellent natural fortresses for the defence of those states. Besides, these mountains exhibit the most delightful prospects : nature has here been most profusely favourable in adding greater beauties to the situation of cottages and farm-houses, than can be enjoyed by royal palaces in other countries, though assisted with all the varieties of groves, terrasses, canals, and cascades. A predecessor of mine is said to have given the name of the *Northern Italy* to the district of *Waas*, which lies some leagues to the eastward of *Bergen* ; and certainly their cannot be a more enchanting prospect.

prospect. All the buildings in it are the church, the parsonage, and a few farm-houses scattered on different eminences. The beauty of the place is much heightened by two uniform mountains gradually rising to a vast height, betwixt which runs a valley near half a league in breadth, and a river which sometimes precipitate itself down the rocks in foaming cataracts, and at others spreads itself into small lakes. On both sides it is bordered with the finest meadows intermingled with little thickets, and by the easy declivities of the verdant mountains covered with fruitful fields and farm-houses, standing above each other in a succession of natural terrasses. Between these a stately forest presents itself to the view, and beyond that, the summits of mountains covered with perpetual snow, and still beyond these ten or twelve streams issuing from the snow-mountain, and form an agreeable contrast in their meanders along the blooming sides of the hill, till they lose themselves in the rivers beneath.

From the many springs issuing from the mountains, and the vast masses of snow accumulated on their summits, whence in summer they gently dissolve, are formed many considerable rivers, the largest of which is the *Glacien* or *Glommen*. But none of them are navigable far up the country, the passage being every where interrupted by rocks and cataracts. The bridges over them are no where, that I remember, walled; but merely formed of timber cases filled with stones, which serve for the piers

piers, on which the timbers are laid. The largest bridge of this kind is a thousand paces in length, and has forty-three stone cafes. In many places, where the narrowness and rapidity of the current will not admit of sinking stone cafes, thick masts are laid on each side on the shore, with the thickest end fastened to the rocks; one mast being thus laid in the water, another is placed upon it, reaching a fathom beyond it, and then a third or fourth, in the like manner, to the middle of the stream, where it is joined by other connected masts from the opposite side. Thus in passing over the bridge, especially in the middle, it seems to swing, which to those who are not used to these bridges, appears so dangerous, that they alight from their horses, till they imagine themselves safe.

Within the bowels of some of the mountains are the most beautiful kinds of marble, some white, others veined, and others variegated with a variety of colours: there is here also blue marble with white veins, green marble with greyish veins, and black marble spotted with white. The mountains also contain that surprizing substance called the magnet or loadstone, in such quantities that some tons of it have been exported. They likewise yield the amianthus or asbestos, of which incombustible linen or paper have been made.

Having heard of some wood petrified by a certain spring I wrote for some samples, and a large parcel of it was sent me. At first I thought it resembled hazle that had lain a long
time

time in the water; but upon a narrower inspection, and drawing out some of the filaments, I found it to be amianthus, much finer than the *Greenland* stone-flax, which the Rev. Mr. *Egede* says, is used there as wicks in the lamps, without being in the least wasted, while supplied with oil or fat. This amianthus, from the softness and fineness of its fibres, deserves to be called stone-silk, rather than stone-flax: I also made a wick for a lamp of it, and it was not consumed; but its light being much dimmer than that produced by cotton, I laid it aside. I have also in my possession a piece of paper of this asbestos, which when thrown into a fierce fire is not in the least wasted; but what was written on it totally disappears.

The manner of preparing this stone-silk or stone-flax, is this: after its being softened in water, it is beaten with a moderate force, till the fibres, or long threads separate from each other; afterwards they are carefully and repeatedly washed till clear of all terrene particles; then the flax is dried in a sieve: all that remains now is to spin these fine filaments, wherein great care is required; besides which the fingers must be softened with oil, that the thread may be the more supple and pliant.

It is remarkable that though this country thus abounds in stones, no flints have been yet found there, so that those for fine arms are imported from *Denmark* or *Germany*: but though there are no flints, there are amethysts, garnets, chalcedonies, agate, jasper, and crystals.

This

This country formerly produced gold; but the expence of working the mines, and separating the gold from the ore being greater than the profit, they have been neglecting. There are, however, silver mines of great value, which give employment to several thousand persons. The copper mines ore likewise extremely rich, and employ vast numbers. Iron is also one of the most profitable products of *Norway*, several hundred thousand quintals being annually exported, chiefly in bars, and the rest cast into cannon, stoves, kettles, &c. Here are also some lead mines; but none of either tin, or quicksilver.

The country produces wheat, rye, barley, white, grey, and green peas; vetches, used as provender for horses; hops, flax, and hemp; many kinds of roots and greens for the kitchen, with a considerable number of hardy flowers. In *Norway*, as well as in *Denmark*, are several kinds of cherries, of which the peasants sell great quantities dried: there are also many sorts of wholesome and well tasted berries, as red and white currants, sun-berries, raspberries; red and white gooseberries; barberries; bilberries, cranberries, strawberries, blackberries, and many other kinds. Several sorts of plums attain to a tolerable ripeness, which can very seldom be said of peaches, apricots, or grapes. However, apples and pears of several kinds are found all over the country; but the greatest part of these are summer fruits, which ripen early; for the winter fruit seldom comes to perfection,

unless the summer proves hotter, and the winter sets in later than usual.

But though with respect to fruit-trees *Norway* must be acknowledged inferior to most countries in *Europe*, yet this deficiency is liberally compensated in the blessings of inexhaustible forests; so that in most provinces immense sums are received from foreigners for masts, beams, planks, boards, &c. not to mention the home consumption for houses built entirely of beams of wood, ships, bridges, and an infinite number of foundaries, which require an immense quantity of charcoal, in the fusion of metals; besides the demands for fuel and other domestic uses; to which must be added, that in many places the woods are felled only to clear the ground and be burnt, the ashes serving for manure.

Among the animals, we shall begin with the horses, which are better for riding than drawing; their walk is easy, they are full of spirit, and are very sure-footed: when they mount or descend a steep cliff, on stones like steps, they first tread gently with one foot, to try if the stone they touch be fast; and in this they must be left to themselves, or the best rider will run the risk of his neck; but when they are to go down a very steep and slippery place, they, in a surprizing manner, draw their hind-legs together under them, and slide down. They shew a great deal of courage in fighting with the wolves and bears, which they are often obliged to do, for when the horse perceives any of them near him, and has a mare or gelding
with

with him, he places them behind him; attacks his antagonist by striking at him with his fore-legs, and usually comes off conqueror.

The *Norway* cows are generally of a yellow colour, as are also the horses; they are small; but their flesh is fine grained, juicy, and well tasted.

The sheep here are small, and resemble those of *Denmark*. The goats, in many places, run wild winter and summer in the fields, till they are ten or twelve years old; and when the peasant who owns them, is to catch them, he must either do it by some snare, or shoot them. They are so bold, that if a wolf approaches them, they stay to receive him, and if they have dogs with them, they will resist a whole herd. They frequently attack the snakes, and when they are bit by them, not only kill their antagonists but eat them, after which they are never known to die of the bite, though they are ill for several days. The owner warms their own milk, and washes the sore with it.

Near *Rofstad*, is a flat and naked field, on which no vegetable will grow. The soil is almost white, with grey stripes, and has somewhat of so peculiarly poisonous a nature, that though all other animals may safely pass over it, a goat or a kid no sooner sets its foot upon it, than it drops down, stretches out its legs, its tongue hangs out of its mouth, and it expires if it has not instant help.

There are few hogs in *Norway*; and not many of the common deer; but the hares, which in the cold season, change from brown or grey

to a snow white, are very cheap in winter. Here are also in some parts of this country elks; but they are not numerous. The rain-deer, however, run wild in herds, and are shot for food by the inhabitants. These animals constitute the greatest, and almost the only riches of the *Finlaplanders*, who live upon their milk, the cheese they make of it, and on their flesh: they make their cloathing, tents, and bed covering of their skins; and of the tendons they make their sewing thread. In *Finmark*, there are vast numbers of them both wild and tame, and many a man has there from six or eight hundred to a thousand of these useful creatures which never come under cover; they follow him wherever he is pleased to ramble, and when they are put to a sledge, transport his goods, from one place to another. They provide for themselves, and live chiefly on moss, and on the buds and leaves of trees. They support themselves on very little nourishment, and are neat, clean, and entertaining creatures.

It is remarkable, that when the rain-deer sheds his horns, and others rise in their stead, they appear at first covered with a skin; and till they are of a finger's length, are so soft, that they may be cut with a knife like a sausage, and are delicate eating even raw; therefore the huntsmen, when far out in the country, and pinched for want of food, eat them, and find that they satisfy both their hunger and thirst. When the horn grows bigger, there breeds within the skin a worm which eats away the root. The rain-deer has over his eye-lids

a kind of skin, through which he peeps, when otherwise, in the hard snows, he would be obliged to shut his eyes entirely: a singular instance of the omniscience and benevolence of the great Creator, in providing for the wants of each creature, according to its destined manner of living.

The hurtful beasts are the bears and wolves already mentioned; the lynx; vast numbers of white, red, and black foxes; and the glutton, a creature which few other countries know any otherwise than by report. This animal receives its name from its voracious appetite; it in size and shape has some resemblance to a long bodied dog, with thick legs, sharp claws and teeth: his colour is black, variegated with brown and yellowish streaks. He has the boldness to attack every beast he can possibly conquer, and if he finds a carcase six times as big as himself, he does not leave off eating as long as there is a mouthful left: when thus gorged he presses and squeezes himself between two trees that stand near together; and thus empties himself of what he has not time to digest. As his skin shines like damask, and is covered with soft hair, it is very precious; it is therefore well worth the huntsman's while to kill him without wounding the skin, which is done by shooting him with a bow, and blunt arrows.

The marten is also hunted on account of its skin, as is likewise the squirrel and the ermine, both of which are therefore shot with blunt arrows. I am in doubt whether the ermine be

different in kind from the *Danish* weasel: its valuable skin is of a beautiful white, and it has a black spot on the tail. The ermines run after mice like cats, and drag away what they catch, particularly eggs, which are their nicest delicacy. Here also are castors, badgers, otters, and hedgehogs

Among the mice, some are thought poisonous, and others are remarkable for their being white, and their having red eyes. But the most pernicious vermin is a little animal, called the *læmus* or lemming, which is between the size of a rat and a mouse; the tail is short, and turned up at the end, and the legs are also so short that they scarce keep the belly from the ground. They have very soft hair, and are of different colours; particularly black, with yellow and brown in streaks, and some in spots. About once or twice in every twenty years, they assemble from their secret abodes in prodigious numbers, like the messengers of heaven to punish the neighbouring inhabitants. They proceed from *Kolens* rock, which divides the *Nordland* manor from *Sweden*, and is held to be their peculiar and native place, marching in vast multitudes through *Nordland* and *Finmark* to the western ocean; and other bodies of them through *Swedish Lapmarck* to the *Sinus Bothnicus*, devouring all the grass and vegetables in their way.* They do this in a direct

* It appears that in their manner of marching these creatures resemble the locusts, of which Mr. *Hanway* has given a curious description. See VOL. XIV. p. 151, 152.

line.

line, and going strait forwards proceed into the rivers or the sea; thus if they meet with a boat on any fresh water river, they run in at one end or side, and out again at the other, in order to keep their course. They carry their young with them on their backs, or in their mouths; and if they meet with peasants who come to oppose them, they will stand undaunted, and bark at them like dogs. This evil is, however, of no long duration; for on entering the sea, they swim as long as they are able, and then are drowned. If any are stopped in their course, so that they cannot reach the sea, they are killed by the frosts of winter, and if any escape, most of them die as soon as they eat the new grass.

As to the reptiles there are neither land snakes nor toads beyond the temperate zone, and even those snakes on the extremities of the temperate climate, are less poisonous than in more southern countries: lizards are here of various colours, as brown, green, and striped. Those that are green are found in the fields, and the others in the cracks and holes of rocks.

Among the fowls are most of those seen in the rest of *Europe*, and some that seem peculiar to this country. Among the former are cocks and hens, turkeys, peacocks, tame and wild geese, ducks, and pigeons; nightingales, larks, quails, partridges, starlings, wrens, magpies, water-wagtails, eagles, falcons, hawks, ravens, cormorants, storks, herons, gulls, owls, bats, and many others: among those that are in a manner peculiar

culiar to this country is the francolin, an excellent land bird, which serves the *Norwegians* instead of the pheasant, its flesh being white, firm, and of a delicious taste. The black cap is almost as small as the wren; the body is black and yellow, it is white under the belly, and the top of the head is black. These birds keep near the houses, and are such lovers of meat, that the farmers can hardly keep them from it, and therefore catch them like mice in a trap.

In short, there are here such incredible numbers of sea and land fowl near the rocks on the sea-shore, that they sometimes obscure the sight of the heavens for many miles out at sea, so that one would imagine all the fowl in the universe were gathered together in one flock.

Norway is also as plentifully supplied with fish as any country in the world. *

* The learned and pious author mentions two or three aquatic animals, which are of so extraordinary a nature as to exceed all the bounds of probability. But as he never saw them, and only depends on the credit of those who furnished him with these accounts; we who can have no proofs of their veracity; must at least suspend our belief; and it seems most prudent to omit describing them till we can have more certain proofs of their existence.

C H A P.



C H A P. II.

Of the Persons, Dress, Employments, and Customs of the Inhabitants; particularly of the extraordinary Manner in which they catch fowl on the highest rocks.

THE Norwegians are generally tall, well made and lively; yet those on the coast are neither so tall nor so robust as those who inhabit the mountains; but are remarkable for being fatter and having rounder faces. The people in general, are brisk, and ingenious; which appears from the peasants not employing any hatters, shoemakers, taylors, tanners, weavers, carpenters, smiths, or joiners; for all these trades are exercised in every farmhouse, and they think a boy can never be an useful member of society, nor a good man, without making himself master of all these arts. They are remarkable for their civility and willingness to serve every one; and a traveller is seldom suffered to pay for his lodging; for they think it their duty to treat the stranger as well as it is in their power, and look upon it as an honour done them, if he accepts of their civilities. Yet the peasant never gives the upper end of the table to the greatest guest that ever comes under his roof; for he thinks that place belongs only to himself. They keep open house for three weeks at *Christmas*, during which their

their tables are spread and loaded with the best provisions they can afford. At *Christmas-eve* their hospitality extends to the very birds; and, for their use, they hang on a pole at the barn door an unthreshed sheaf of corn, which draws thither the sparrows and other small birds.

The inhabitants of the trading towns live, with respect to provisions, much in the same manner as the *Danes*; but the peasants keep close to the manners of their fore-fathers. Thin oat-cakes are their common bread; but upon particular occasions, as weddings or entertainments, they have rye-bread. If grain be scarce, which generally happens after a severe winter, the peasants have recourse to a disagreeable method of preserving life, by boiling and drying the bark of the fir-tree, mixing it with a little oatmeal, and making it into a kind of bread. Even in times of plenty they eat a little of it, that they may think it less disagreeable in a time of scarcity.

The lakes and rivers furnish the people with plenty of fresh water fish, and the mountains with game. For their winter stock they kill cows, sheep, and goats; part of which they pickle and smoak, and some of it they cut in thin slices, sprinkle it with salt, then dry it in the wind, and eat it like hung beef. They are fond of brandy, and of smoaking and chewing tobacco.

The *Norwegians* who live in towns have nothing remarkable in their dress; but the peasants do not trouble themselves about fashions. Those called *strile-farmers* have their breeches and stockings of one piece. They have a wide loose jacket, made of a coarse woollen cloth;

as are also their waistcoats, and those who would appear fine have the seams covered with cloth of a different colour. The peasants of one parish are remarkable for wearing black cloaths edged with red; another for wearing all black; the dress of another parish is white edged with black; others wear black and yellow; and thus the inhabitants of almost every parish vary in the colour of their cloaths. They wear a flapped hat, or a little brown, grey, or black cap made quite round, and the seams ornamented with black ribbons. They have shoes of a peculiar construction without heels, consisting of two pieces; the upper leather fits close to the foot, to which the sole is joined by a great many plaits and folds. When they travel, and in the winter, they wear a sort of half boots that reach up to the calf of the leg, and are laced on one side; and when they go on the rocks in the snow they put on snow shoes. But as these are troublesome when they have a great way to travel, they put on scates about as broad as the foot, but 6 or 8 feet long, and pointed before; they are covered underneath with seal-skin, so that the smooth grain of the hair turns backwards to the heel. With these snow-scates they slide about on the snow as well as they can upon the ice, and faster than any horse.

The peasant never wears a neckcloth, or any thing of that kind, except when he is dressed; for his neck and breast are always open, and he lets the snow beat into his bosom. On the contrary, he covers his veins, binding a woollen fillet round his wrists. About their body they wear a broad leather belt, ornamented with

convex brass plates; to this hangs a brass chain, which holds their large knife, gimblet, and other tackle.

The women at church, and in genteel assemblies dress themselves in jackets laced close, and have leather girdles, with silver ornaments about them. They also wear a silver chain three or four times round the neck, with a gilt medal hanging at the end of it. Their handkerchiefs and caps are almost covered with small silver, brass, and tin-plates, buttons, and large rings, such as they wear on their fingers, to which they hang again a parcel of small ones, which make a gingling noise when they move. A maiden-bride has her hair platted, and hung as full as possible with such kind of trinkets, as also her cloaths: for this purpose they get all the ornaments they can.

Their houses are, in general, built of fir and pine-trees, the whole trunks of which are only chopped even to make them lie close, and then laid one upon another, and fastened with mortices at the corners. These trunks are left round as they grew, both on the inside and outside of the house, and are frequently boarded over and painted, especially in the trading towns, which gives them a genteel appearance.

In the country villages the houses are built at a distance from each other, with their fields and grounds about them. The store-house for the provisions is generally at a distance from the dwelling-house, for fear of fire, and placed high upon poles, to keep the provisions dry, and preserve them from mice, and all kinds of vermin.

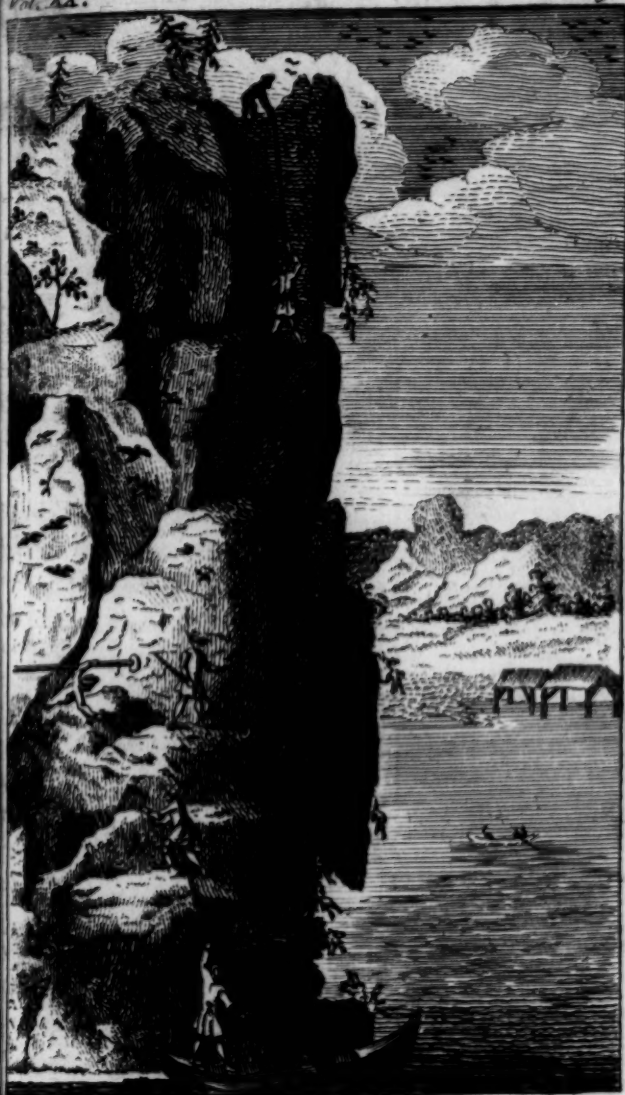
vermin. The kitchen stands also separate, as do the barns, hay-loft, cow-houses, stables, and the like. A farm has likewise commonly a mill belonging to it, situated by some rivulet, besides a smith's forge; for every farmer, as hath been observed, is his own smith. Up the country, where timber for building is but of little value, there is many a farm-house as large as a nobleman's seat; it is frequently two stories high, and has a railed balcony in the front, and the additional buildings resemble a little village. The common farm-houses have, however, only the ground floor, and no other window but a square hole in the wall, which is left open in summer; but in winter or in wet weather is filled up with a wooden frame covered with the inward membrane of some animal, this is very strong, and as transparent as a bladder. This hole which is as high as it can be placed, also answers the purpose of a chimney by serving to let out the smoke.

Under the light-hole generally stands a long thick table, with benches of the same wood; and at the upper end is the high seat which belongs to the master only. In towns these houses are covered with tiles; but in the country the people lay over the boards the sappy bark of birch-trees, which will not decay in many years. They cover this again three or four inches thick with turf, on which good grass always grows.

The peasants are busied in cutting wood, felling and floating of timber, burning charcoal and extracting of tar. Great numbers are employed in the mines, and at the furnaces.

and stamping mills; and also in navigation and fishing, besides hunting, and shooting; for every body is at liberty to pursue the game, especially in the mountains, and on the heaths and commons, where every peasant may make use of what arms he pleases.

It has been already observed, that the catching of birds afford some of the inhabitants a very good maintenance: but it is impossible to give a just idea of the fatigue and danger with which the people search for the birds in the high and steep rocks, many of which are above 200 fathoms perpendicular. These people who are called birdmen have two methods of catching them: they either climb up these perpendicular rocks, or are let down from the top by a strong and thick rope: when they climb up they have a large pole of eleven or twelve ells in length, with an iron hook at the end. They who are underneath in a boat, or stand on a cliff, fasten this hook to the waistband of the man's breeches who climbs, by which means they help him up to the highest projection he can reach, and fix his feet upon. They then help up another to the same place; and when they are both up, give each his bird pole, and a long rope which they tie at each end round their waists. The one then climbs up as high as he can, and where it is difficult, the other by putting his pole under his breech, pushes him up, till he gets to a good standing place: the uppermost of the two then helps the other up to him with the rope; and thus they proceed till they get to the part where the
birds



The manner of Fowling in Norway.



birds build, and there they search for them. As they have many dangerous places yet to climb, one always seeks a convenient place to stand sure, and be able to hold himself fast, while the other is climbing about. If the latter should happen to slip, he is held up by the other who stands firm; and when he has got safe by those dangerous places, he fixes himself in the same manner, that he may assist the other to come safe to him: and then they clamber about after birds where they please. But accidents sometimes happen; for if the one does not stand firm, or is not strong enough to support the other when he slips, they both fall and are killed; and thus some perish every year.

When they thus reach the places that are seldom visited, they find the birds so tame that they may take them with their hands; for they are loth to leave their young; but where they are wild, they either throw a net over them in the rock, or entangle those that are flying with a net fixed to the end of their poles. Thus they catch vast numbers of fowls, and the boat keeping underneath them, they throw the dead birds into it, and soon fill the vessel. When the weather is tolerably good, and there is a great deal of game, the birdmen will continue eight days together on the rocks; for there are here and there holes in which they can securely take their repose: they draw up provisions with lines, and boats are kept coming and going to take away the game.

On the other hand, many rocks being so steep and dangerous that they cannot possibly

climb up them, they are then let down from above; when they have a strong rope 80 or 100 fathoms long, and about three inches in thickness. One end of it the birdman fastens about his waist, and then drawing it between his legs so that he can sit on it, he is let down with his bird-pole in his hand, by six men at the top, who let the rope sink by degrees, but lay a piece of timber on the edge of the rock, for it to slide on, to prevent its being torn to pieces by the sharp edge of the stones. Another line is fastened round the man's waist, which he pulls to give signs when he would have them pull him up, let him lower, or keep him where he is. He is in great danger of the stones loosening by the rope, and falling upon him; he therefore wears a thick furred cap well lined, which secures him from the blows he may receive from small stones; but if large ones fall he is in the greatest hazard of losing his life. Thus do these poor men often expose themselves to the most imminent danger, merely to get a subsistence for their families. There are some indeed who say there is no great hazard in it, after they are accustomed to it; but at first the rope turns round with them, till their heads are giddy, and they can do nothing to save themselves. Those who have learnt the art make a play of it; they put their feet against the rock, throw themselves several fathoms out, and push themselves into what place they please. They even keep themselves out on the line in the air, and catch with their poles numbers of birds flying out and into their holes.

holes. The greatest art is required in throwing themselves out, so as to swing under the projection of a rock where the birds gather together; here they fix their feet, loosen themselves from the rope, which they fasten to a stone, to prevent its swinging out of their reach, and then the man climbs about and catches the birds either with his hands, or his pole, and when he has killed as many as he thinks proper, he ties them together, fastens them to the small line, and by a pull gives a sign for those above to draw them up. In this manner he works all day, and when he wants to go up, he gives a sign to be drawn up, or else works himself up with his belt full of birds.

When there are not people enough to hold the rope, the birdman fixes a post in the ground, fastens his rope to it, and slides down without any help, to work as before. There are in some places steep cliffs of a prodigious size, lying under the land, and yet more than 100 fathoms above the water, which are likewise very difficult to be got at. Down these cliffs they help one another in the above manner, and taking a strong rope with them, fasten it here and there in the cliff, where they can, and leave it all the summer: upon this they will run up and down, and take the birds at pleasure. It is impossible to describe how frightful and dangerous this bird-catching appears to the beholders, from the vast height, and excessive steepness of the rocks, many of which hang over the sea: it seems impossible for men to enter the holes under these projections, or

to walk 200 yards high on crags of rock where they can but just fix their toes.

The birds being brought home, they eat part of them fresh, and part is hung up to dry for the winter season. These birds afford the inhabitants a very good maintenance, partly from their feathers and down, which are gathered and sent to foreign parts, and partly from their flesh and eggs. Some sorts of the latter are as good as hens eggs, and though of various colours and sizes are sent to market.





T R A V E L S

THROUGH THE

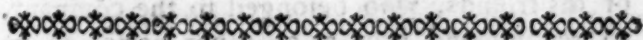
Most NORTHERN Parts of EUROPE,

Particularly

NORWAY, DANISH, SWEDISH, and MUSCOVITE LAPLAND, BORANDIA, SAMOJEDIA, ZEMBLA, and ICELAND.

Extracted from

The JOURNAL of a Gentleman employed by the NORTH SEA COMPANY of COPENHAGEN to make DISCOVERIES.



C H A P. I.

The Occasion of these Travels. The Author sails from Copenhagen, and arrives at Christiana in Norway, where he hunts the Elk. A Description of that Animal.

FREDERIC III. King of Denmark being desirous of increasing the trade of his kingdom, established two companies of merchants at Copenhagen, his capital; the one an Iceland company, and the other a company of
of

of traders to the north. The latter having observed that the trade to *Norway* was very beneficial, presented a petition to his *Danish* Majesty, in *February*, 1653, representing that great profit would arise to his subjects by enabling them to enlarge their trade, by making farther discoveries to the north, whence several valuable merchandizes might be imported, his Majesty readily granted their request, and allowed them to extend their commerce as far northward as they thought proper. Upon which they fitted out several ships for that purpose. The author, a *French* gentleman, happened to be at *Copenhagen* when one of the northern fleets was outward-bound, and being informed that the King had commanded those concerned in this enterprize to make all possible discoveries of the countries to which they came, and to bring back the most extraordinary curiosities they could find, he desired one of his friends, who belonged to the company, to recommend him as a proper person to go surgeon of one the ships, upon which he was entertained, and entered into their service. Having given this introduction we shall proceed in the following extract as near as possible in in the gentleman's own words.

All our merchandize and provisions being on board, we embarked in the beginning of *April* 1653, weighed anchor, and set sail from *Copenhagen*, with two ships in our company. We soon arrived at *Kat-gat*, a streight which divides the *German* from the *Baltic* sea. This is

a dan-

a dangerous passage full of rocks, extending about 40 leagues from *Elfinore* to *Schagerhort*.

When we arrived a-breast of *Mailstrand*, a small sea-port town 30 leagues from *Copenhagen*, the wind veered to the north-ward, drove us back ten leagues, and forced us into a creek called *Schalot*, where we cast anchor, and rode safe under the castle, which looked rather like a heap of ruins than a place inhabited, and is only famous for its promontory, which is well known to all the mariners, who use the *Baltic*. Here we staid three days, when the wind shifting again to the eastward, we proceeded on our voyage; but had not been at sea above four hours, before the wind blew so stiff a gale from the north-east, that we were forced to leave the coast of *Gottenburgh*, and steer directly over to that of *Jutland*; where we drove at a great rate, and were in such danger from the shoals with which this road abounds, that had not we had a skilful pilot and able sailors, we should certainly have run aground; but making a quick tack, we gained the advantage of the wind, and after a few days sailing had sight of *Christiansand* in *Norway*, a promontory that takes its name from a small village at its foot, where there is a commodious port. Our stay here was very short: for the next day, we proceeded to *Christiana* or *Oslo*, the capital of one of the five governments of that kingdom.

As soon as we were got into port, we went ashore to deliver our letters to the company's agents, who gave us a very cordial reception. One of them hearing I was a stranger, and had
been

been recommended by one of their society, behaved to me with great civility; shewed me every thing worth seeing, and commanded one of his servants, who spoke *French*, to attend me in a short excursion, three or four miles up into the country. Early the next morning we took horse, and rode to a large village named *Wisby* * nine miles from *Christiana*. The houses are here built of wood and covered with turf, they are very low, without either iron work or windows, except a lattice on the top to admit the light.

The peasants of *Norway* are remarkable for their simplicity and hospitality. The women, who are very handsome, though red haired, are fond of strangers, look after the cattle, of which there is here great plenty: they are also excellent house-wives, and in general make their own family cloth. The country affords excellent game, as stags, elks, roebucks, boars, goats, lynxes, otters, rabbits, hares, and wild cats of various colours, with plenty of wild fowl.

When we were returning towards *Christiana*, we met one of the neighbouring gentlemen followed by two servants and a pack of dogs going to hunt the elk; who, knowing the man that was with me, invited us both to partake of his diversion, and as I had time enough to spare, I readily accepted his proposal. After we had rode about a mile we met his huntsman with more of his servants, and ten or twelve of

* The Capital of *Gothland*, where the famous marine laws were made.

the peasants, who led us three miles farther to a wood full of bushes, at the entrance of which we dismounted, and gave our horses to one of his domestics. Preparations had been made for the chase the day before by the gentleman's vassals. We were scarce 40 yards within the wood, before we perceived an elk, who instantly dropped, being seized, as they told me, with the falling sickness, whence they derive the name of elk, which signifies a miserable creature, and it seems that they often fall in this manner at the beginning of the chase. Had not this accident happened, I believe it would have been hard for us to have brought him down, as I perceived soon after, when we had roused another, which we chased above two hours, and should never have been able to have taken him, had he not also dropped down dead. He killed three of the best dogs with his fore feet, and the gentleman being extremely sorry for their loss, would hunt no more; but sent to a farm of his a mile off for a cart to carry the game we had caught to his castle, and insisted on our going home with him, where he treated us in a very splendid manner. This castle was an odd sort of a building, and like the rest in that country, was void of elegance or taste.

The elk is as big as a large horse, and his body like a stag's, but larger and longer; his legs are also long, his feet broad and cloven, his antlers large, hairy, and broad like a fallow deer's, but he is not so well furnished with horns as a stag.

At my departure the lord of the castle made me a present of the two left shanks of the elks we had killed, or rather seen die of themselves, letting me know that this was no small favour, they being an excellent cure for the falling sickness. To which I replied by my interpreter, that I wondered since the foot of an elk had such virtue in it, why the animal, that always carried it about with him, did not cure himself. The gentleman reflecting on what I said, laughed out aloud, and told me I was in the right, for he had given it to several persons afflicted with the same disease without its producing a cure. Upon which he had long suspected that the pretended virtue of the elks foot was a vulgar mistake, of which he no more doubted than that the eating of the flesh of the beast infected people with their distempers. He then gave me many instances of the ill effects produced on human bodies by eating the flesh of elks.

The gentleman obliged us to spend the night with him, and having entertained us in a plentiful and agreeable manner, we took our leaves of him early the next morning and returned to *Christiana*, where we staid four or five days, and then weighing anchor, sailed for *Berghen*; but being becalmed in our passage for five days, we employed ourselves in catching fish, of which we caught such a quantity, that we kept *Lent* a long while after, being unwilling to throw the fish over board.



CHAP. II.

A Description of Berghen. The Author arrives at Drontheim, and sets out for the Copper and Silver Mines, into one of which he descends. A Description of the Mine, and the Manner in which the Miners spend their Time. He returns to Drontheim, continues his Voyage, and lands at a Village, where the Ship's Crew purchase a Wind. The selling of Winds accounted for. The Ship puts into Varanger to refit. The Religion, Customs, and Manners of the Danish Laplanders.

BERGHEN, the capital of the province of the same name in Norway, has one of the finest ports in Europe, and is divided into the upper and lower town, the one built on the rocks, and the other on the sea-shore. It is a large trading town full of merchants, and was formerly an archbishopric; but it has not been acknowledged such since the Reformation. The Archbishop's palace was given to the Hanse towns, for their ancient merchants to live in, and the greatest part of the houses were turned into ware-houses, which still bear the name of cloisters, and the merchants are called Monks, though they do not wear a cowl, nor observe the rules of any order. The King has, however, obliged them so far to keep up the form of a religious house, that none of the merchants who live in it are allowed to marry without remov-

ing. The principal branch of trade carried on at *Berghen*, are herrings, cod, and stock-fish, for which there is a great vent in *Muscovy*, *Sweden*, *Poland*, *Denmark*, *Germany*, *Holland*, and other parts of *Europe*.

As soon as we had discharged the cargo we had to deliver at *Berghen*, we set sail with a south-west wind for *Drontheim*, half our lading being consigned to the surveyor of the copper and silver mines, for the use of the miners and other workmen; it consisting principally of bread and beer; but being several days becalmed, we again caught a great quantity of klip-fish, a great part of which we salted and barrelled. They are a kind of cod, bigger then those of *Newfoundland*, and obtain the name of klip-fish from their never leaving the rocks; they always lying upon or under them; *klippe*, in the *German* tongue, signifying a rock.

On our arrival at *Drontheim*, we applied to the surveyor to unlade our ships as fast as possible, that we might pursue our voyage; but he told us, he could not begin till the officer, who were to receive their provisions, came back from the mines, and offered to send a messenger for him, whom I got leave to accompany. Early the next morning the surveyor's man and I mounted on horse-back, and began this journey; but the roads were so very rugged that we could not reach farther than *Steckley*, which is only eighteen miles from *Drontheim*; for the night came on, and we had a long wood to pass through, in which were wolves, lynxes and
boars

boars in great numbers, that render travelling in the dark very dangerous.

The next night we arrived at our journey's end, and lodged at the forges, where according to the custom of the country we were entertained by the people, who have the care of the mines, with tobacco, beer and brandy. And our host believing that we would not think ourselves welcome unless we were made drunk, plied us so fast with bumpers, that there was no avoiding a debauch. I here became acquainting with one of the officers of the mines who spoke *French*, and promised, on my expressing a desire to go down into one of them, to gratify my curiosity. The next morning the messenger who came hither returned back to *Drontheim* with an officer proper to clear the ship.

Having breakfasted with the person who spoke *French*, and the master miner, they went with me 50 or 60 paces from the forges, which are upon an high mountain, to the mouth of one of the mines, over which was erected a machine resembling a crane turned by two men in two great wheels to draw up the oar, and the master and I being fixed in a wooden bucket were let down above 50 fathoms. Never did I see a more horrid prospect, or what appeared a truer picture of the infernal regions. Nothing was to be seen all around but rugged caverns, flames of fire, and creatures that appeared to have a nearer resemblance to fiends than to men. They were dressed in black leathern jackets, with leathern mufflers about their heads just under their eyes, reaching down to the breast,

and had leathern aprons. These miners have all different employments. Some use the chissel and some the hatchet to knock out the copper stones: others search for new veins of metal, and others try to discover caverns filled with water, which sometimes unexpectedly burst forth, and drown those in the mines. The master miner, who descended with me, perceiving I was afraid, and that I was taken with a cold fit, rung a bell, which being a signal for the people above to draw us up, we soon ascended with the same ease with which we had gone down. When I was glad to breathe the fresh air, freed from the unwholesome damps of these subterraneous dwellings.

We went to the house of the officer who spoke *French*, and were entertained in a very handsome manner: after dinner that gentleman ordered horses to be got ready to take me to the silver mines, and the master miner accompanied us. Having introduced me to the surveyor, we were each of us presented with a large glass of brandy, and then treated with beer and tobacco. When we had smoaked and drank as much as the surveyor thought fit, he conducted us to the forges, which were about a mile from his house, at which, as in those of the copper mines, there are always several workmen employed, some of whom break the stones, others wash them, while others melt and refine the oar. These mines turn to a very good account, and are not the least part of his *Danish* majesty's revenue. We soon after reached the mouth of a mine, down which we went in the same manner as at the
copper

copper mine. These miners are cloathed like the others, and their work and habitations are much the same. The miners both in the one, and the other never work in winter. In spring and autumn, they only labour three hours in the forenoon, and three after dinner. But in summer they work four hours in the morning and five in the afternoon. The rest of their time they spend in mirth and feasting. They delight much in dancing, and have their hautboys, violins and other instruments for that purpose. This merry life they are able to support, being paid a crown a day all the year round. On my return to the copper forges I found the people at their sports, and was not a little pleased to see the variety of their humours and pastimes.

Having seen every thing worth notice at the mines, the surveyor took us home with him and treated us with the usual collation of brandy, beer and tobacco; we afterwards partook of a good supper, and when we had sufficiently refreshed ourselves went to bed. In the morning the master miner and I, after a plentiful breakfast, took leave of the surveyor, and rode back to the copper mines, where having thanked the officer who spoke *French* for his civilities, the master miner and I set out for *Drontheim*.

Night overtaking us before we had proceeded eight miles, we were obliged to take up our quarters at a peasant's house in the next village, when the honest man knowing my companion, thought himself highly honoured by having such

a guest, and therefore did his utmost to oblige us. Before we sat down he brought us his brandy, tobacco and beer; provided a couple of pheasants, and a hare he had lately killed, for our supper. For that game being free for the boors in those parts, they are seldom unfurnished with them. After supper we all sat down to smoking, and continued drinking brandy and beer almost all night, till the peasant perceiving that the master miner was quite drunk, was so rejoiced at it, that he soon became in as bad a condition himself, nor was I much better. We had all now our dose. Upon which some clean straw was brought, and spread in the middle of the chamber to serve instead of beds, on which we lay down together, and slept till morning; when being resolved to reach *Drontheim* that night, I arose before the master miner, and the boor awaked, and by signs made the boor's sons understand, that I wanted the horses to be got ready, and they being saddled I roused my companion and his host, but they were no sooner up than we again fell to eating and drinking, which being at length ended, we mounted on horseback, and made the best of our way to *Drontheim*, where we arrived before it was dark.

In two days after my return the ship having taken in her stock of provisions and other necessaries, set sail with a fair wind, to continue our voyage to the north, but after a few days we were becalmed under the Arctic circle, and some of our crew being so superstitious as to give credit to the opinion, that the inhabitants

of

of the neighbouring coast, like those of *Finland*, could rule the elements, and dispose of the winds at their pleasure, our captain sent his boat ashore with the mate to purchase a wind of them, that being the commodity he most stood in need of, and though I believed nothing of the matter, I had the curiosity to accompany those employed in this ridiculous commission.

We landed at the first village we came to, and as the mate could speak enough of the language to make himself understood, he soon found out the chief necromancer; told him what he wanted, and asked if he could furnish us with a wind that would last till we arrived at *Mourmanskeimore*, to which the necromancer gravely replied, that he could not, for his power extended no farther than the promontory of *Rouxella*. The mate considering it was a great way thither, and that if we reached so far we might easily make the north cape, desired him to go on board with us, and drive a bargain with the captain: to this the wizard consenting, took three of his comrades with him, and leaping into a small fishing boat went aboard our ship, where the captain and he soon agreed upon the price, and he was paid ten kroners, which is about five or six and thirty shillings sterling, and a pound of tobacco. When the bargain was concluded, and the money paid, the wizard tied a woollen rag about half a yard long and a nail broad, to the fore-mast. This rag which had three knots was all the captain had for his money, and the necromancer immediately

mediately returned in the fishing boat to the village with his companions.

He had not been gone long when the captain, according to the instructions he had received, untied the first knot in the rag, and soon after a brisk gale sprung up from the west-south-west, which drove us and the other ships in our company thirty leagues beyond *Maelstrom*, a whirlpool in the *Norwegian* sea, that has proved fatal to many vessels. For this reason such as are acquainted with those coasts keep eight or ten leagues out to sea to avoid both that and several other eddies, as well as the rocks that lie off *Ostraford*.

The wind beginning now to shift a little to the northward, the captain untied the second knot, and the wind continued till we reached the cape of *Rouxella*. After we had passed that promontory, the needle of our compass turned back half an inch, from which some fancied that there was a load-stone in the mountain. However, if we had not had a very expert pilot we should certainly have lost our course. He shut up the compass, and knowing that the other ships in our company were in the same trouble as ourselves, hung out a flag on the fore-top-mast head, as a signal for the ships to follow us. We were two days and nights in this dangerous situation, having nothing to depend upon but the pilot's experience; but on the third day, when we were at a considerable distance from the mountains of *Rouxella*, the needle again pointed to the north,

whence

whence we concluded that we drew near the north cape.

By this time the wind failing us, our captain untied the third knot, and soon after a most dreadful tempest blew from the north-north-east, upon which we were obliged to take in all our sails and drive before the wind under our bare poles, expecting every minute to go to the bottom; dreading lest this should be a judgment inflicted upon us for our infernal commerce. However, on the 4th day the storm ceased, when we were under great concern at our having lost sight of the other vessels, which we feared were by this time lost: but having a favourable gale, we continued our course, resolving to make the first port in order to rest.

With respect to the sale of winds, for which these northern people are very famous, it is necessary to observe, that like all other species of witchcraft and necromancy, it is no more than mere fraud and imposture. Those who deal in it study the weather, and from constant observation, are able to judge of the variation of winds for several days to come, and take care to start so many difficulties in making their bargains, that they are sure never to come to a conclusion, till the signs appear by which they are morally certain that those winds will blow, which they pretend to sell. When our supposed conjuror affirmed that his power reached no farther than *Rouxella*, it ought to be understood, he very well knew by experience that cape to be the limit of his observations, and

and that he should risk his credit. if he presumed to exceed his bounds. This account we have received from some intelligent persons who resided a while in *Iceland*, where the people are the most famous for this kind of traffic, and they sell them with less limitation, because living in an island, they are more able to judge of the variation of winds in all the seas round about them. This species of knowledge is confined among a few people, who by this means keep their neighbours in subjection, and put foreigners under tribute; nor are these strange notions much to be wondered at in a barbarous country, where religion is at a very low ebb, and learning has not improved the mind.

The coasts of the sea all over the north are so full of rocks, that the ports and creeks are almost inaccessible, and we were obliged to sail two days longer before we could make a proper port. However, we at length reached the coast of *Wardhuys*, the chief town of *Danish Lapland*, where there is a castle, which has a garrison of two companies of soldiers, belonging to the King of *Denmark*, and also a collector to receive the duties imposed on foreigners trading to or from *Archangel*, who suffered us to pass without examination, judging from our saluting the castle, and by our colours, that we were *Danes*. We then sailed to *Varanger*, and cast anchor half a league from the town, when the captain being impatient till he found a place where we might refit, and being desirous of obtaining some information in relation to trade, ordered out the long-boat, and taking with him

him eight men well armed, rowed towards the town, where he arrived in about half an hour. *Varanger* is a populous town and a convenient port, but so little frequented, that the inhabitants; amazed at seeing them, gave them small encouragement for trade, but offered their assistance to refit the ship.

The Captain having observed the commodiousness of the harbour, returned with the boat, upon which we weighed anchor, and entered the port; when we unladed the cargo, which consisted of bales of cloth, and rolls of tobacco, with which we designed to have traded. These goods were locked up in a house near the shore, and a watch set to guard them. To some of the principal inhabitants we presented bits of roll tobacco, which they valuing more than gold, it secured their friendship, and in return, they treated us with the best they had, particularly with dry fish, which serves them instead of bread; with the flesh of rein-deer, which I did not think very palatable; with bear's flesh, and that of other wild beasts, of which we had no knowledge. They also treated us with fresh fish, boiled without salt, and served up either with the oil of other fish, or a sour liquor that is highly esteemed by them. We could not, however, bear them company in their repasts, and their dainties not suiting our taste, we sent for provisions from the ship, the chief of which was salt beef and biscuit; but when we offered some of it to the *Laplanders*, we found that our food was as disagreeable to them as theirs was to us,

Their

Their sour drink consists of an infusion of juniper-berries, and of a grain-like lentils, the name of which I forgot; it grows there in great abundance, as do also juniper-trees; of that grain they also make brandy, which has the same effect as that distilled from grapes, and their common drink is as strong as *French wine*. Our beer was indeed more acceptable to them than our meat; they drank freely of it, and were also pleased with the brandy we gave them; yet they preferred their own sour drink to either our brandy or beer.

The religion of *Lapland* is *Lutheranism*; but though they have clergy among them, they are so superstitious, that if in the morning they meet a beast in their way whose appearance is esteemed ominous, they return home and do not stir out again all that day; and when they go fishing, if they take but one fish in the first draught, they think it an ill omen, pack up their net, and leave work for that time.

Both the men and women are of a low stature, but are strong and active. Their faces are broad and flat, and particularly their noses. Their eyes are small like a hog's, and their eyelids in general make them look as if they were bleary-eyed. They are of a swarthy complexion, and are of a rude uncivilized and lascivious disposition; especially the women, who readily prostitute themselves to all comers, if they can do it without the knowledge of their husbands.

The men are cloathed in rein-deer skins, with the hair outwards; their coats are short and

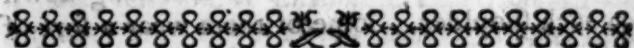
and reach down to the middle of their thighs: their breeches and stockings are of the same materials, with the hair outwards; but over these some of them wear a kind of boots made of fish skin, which, though rough and coarse, are stitched so neatly, that the seams are hardly to be seen. Their bonnets are also made of rein-deer skins, with the hair outwards, but are edged with a strip of either grey or white fox skin.

Their caps are like those of the Norwegian women, and are made of coarse canvas, and their hair is twisted up in two rolls, that hang down on each shoulder. Some of them wear a sort of ruff eight fingers broad, which they tie behind. Their other cloaths are made either of coarse cloth, or the skins of rein-deer, with the hair turned outwards; but their shoes are of fish skins with the scales on, and somewhat resemble the wooden shoes worn by the peasants in France.

Their houses resemble those of the boors about Christiana. They have no light but what enters by a hole at the top of the hut, and do not make use of beds any more than the other Laplanders. The whole family, as the master, mistress, children, and men and maid servants, lie down together promiscuously, upon bear skins spread in the middle of the room, which, when they rise in the morning, are taken up and laid by, till they are wanted again at night. In every house there is a great black cat which they highly value. The Laplanders talk to it as if it was a reasonable creature;

ture: every night they go out of their huts with it, as if to consult it alone; and in parties of fishing or hunting it follows the people like a dog.

We unladed the ship the day after our arrival, and the inhabitants helped us to haul her ashore, when the Captain finding that she was more damaged than he expected, desired the *Laplanders* to provide him timber to refit her, to which they readily agreed, and the crew went to a neighbouring mountain to fell it.



CHAP. III.

The Author and some others travel into the Country, in order to trade with the Inhabitants. The Manner of travelling in Sledges drawn by Reindeer. A Description of that Animal. The Customs and Manners of the Russian Laplanders. The Ceremonies of a Lapland Funeral, and the Adventures they met with upon the Road till their Return to Varanger; with a general Character of the People of Lapland; and an Account of their Beasts, Birds, and Fishes.

AS we found that the ship would be some time in refitting, our supercargo thought it would not be improper to take a journey into the country, to try whether any trade could be carried on with the peasants there; and for this

this purpose picked out me, and two more of the ship's company, to attend him.

Early the next morning, which was the 12th of May, we set out, taking with us some cloth and tobacco to trade with, and salt beef and pork for our provisions; having engaged three of the inhabitants of *Varanger* to attend us, both to shew us the way, and to help to carry our goods and provisions to the next village. We followed them through woods, mountains, and valleys without meeting any living creature, till about four o'clock in the afternoon, when we perceived two white bears of a prodigious size approach, as we thought, to devour us; but our guides observing the terror we were in, bid us not be afraid, for we need only have our arms ready for defence in case they approached too near us. Upon which we cocked and primed our pieces, and prepared our flints; but whether the bears were frightened at the fire which struck from our flints, or smelt our powder, they soon fled away so fast, that they were presently out of sight.

As we were descending a mountain an hour before night, we perceived at the foot of it a dozen houses at a considerable distance from each other, and a little beyond them a herd of beasts like stags, which our guides told us were rain-deer. On our arrival at the village, our guides conducted us to a hut, when being very weary, we were glad to rest ourselves, for we had made a long journey in a very bad way, with our luggage at our backs, which tired and encumbered us. We presented our host with a

piece of roll tobacco, and he received in with extraordinary joy, assuring us, he had not had so valuable a present in nine months before; and in return he brought out his brandy bottle, some rain-deer's flesh dressed without salting, and some dried fish, which we gave to our guides, and supped ourselves upon the provisions we had brought with us; after which we went to sleep upon bear's skins, after the fashion of the country.

In the morning we asked our host if he had nothing to barter with us for cloth and tobacco, to which he answered that he had some wolf, fox, and white squirrel skins, and that his neighbours had some of the same commodities, and would gladly exchange with us. We bid him, by our interpreters, bring out his skins, and if he had any cloaths made of rain-deer skins, we would deal with him for four suits, which we wanted to keep us warm; accordingly he brought forth his merchandize, which we bought, and paid him part in tobacco and part in cloth. We also trucked with his neighbours as long as they had any thing worth buying, and then desired our host to lend us some rain-deer to carry us farther up the country, to which he readily consented; and taking down a horn that hung up in his cottage, went out and blew it, upon which fourteen or fifteen of those animals came running towards the hut, six of whom he immediately yoked to six sledges. In one of them we put our merchandize and provisions, another we assigned to one of our guides who understood

derstood the language of the *Muscovite Laplanders*, and that of the *Kilops*, dismissing the two other inhabitants of *Varanger*, after having first paid them in tobacco for their trouble. We then put on our *Lapland* cloaths, and each of us lying down in his sledge, was covered with a bear's skin. At the back of the sledge were two girths made of rain-deer's skin leather, in which we thrust our arms up to the shoulders to keep ourselves steady, and we had each a stick with a strong ferrel to it to support the sledge, if it should be in danger of overturning against the stumps of trees, or stones lying in the way. We were no sooner ready to set out, than our host muttered some words in the ear of the rain-deer; and when I afterwards enquired of our guide what he meant by it, he gravely replied with the utmost simplicity, that it was to tell them whither they should carry us. However, custom had made this muttering so familiar to them, that when our host had gone to all the six, they set off with an amazing swiftness, and continued their pace over hills and dales without keeping any beaten path, till seven o'clock in the evening; when they brought us to a large village situated between two mountains, on the borders of a great lake. Stopping at the fourth house in the place, and beating the ground with their feet, the master of the house came with some of his servants to take us out of the sledges, and unharnessed our cattle, one of them bringing out a little juniper can filled with brandy, of which he gave each of us a brimmer out of a larger

vessel that was also made of juniper wood. This it seems was to revive our spirits, our guide having informed him, that we were frightened at our being drawn so swiftly by these animals, we not being used to that way of travelling.

The rain-deer is of the colour of the stag, and is not much bigger. The horns of this animal are somewhat higher than those of the stag, but more crooked, hairy, and no so well furnished with branches. They have cloven feet like their's, but they are as big as the hoofs of oxen. Of the milk of the females the *Laplanders* make good butter and cheese. Their harness is a collar of rain-deer leather, by which they are fastened to the shafts of the sledge, not much unlike the manner in which a horse is fastened to a chaise; and thus they draw it with incredible swiftness, without being guided by the rider.

When we got out of our sledges, our host conducted us into his hut, which, like the rest of the cottages in the place, was very little, low, and covered with the bark of trees, the light entering in at a hole in the top. The people here were clothed much like those of *Varanger*, their apparel being of the same materials and make, but longer. The women were also dressed in rain-deer skins, with the hair outwards, and their hair was twisted like that of the women of *Varanger*; but instead of a canvas cap, they wore on their heads a high bonnet made of the same skins as their cloaths, with the hair outwards.

We

We gave our host a piece of our roll tobacco about two inches long, with which he was highly pleased, and in the most hearty manner returned us his thanks. We also gave a piece not quite so long to each of the inhabitants of the place to make them our friends, and the better to secure ourselves against their attempts, for they seemed more uncivilized than those we last dealt with : we again supped on the provisions we had brought with us, and our guide eat some of our host's salt fish, and fresh rain-deer venison. We asked how many leagues we had come that day, he answered about thirty, and that we were in the territories of *Mourmanskeimore*. The inhabitants talked a language very different from that used at *Varanger* ; but our guide had been often in the country, and understood them. After supper we lay down on bear skins, to take our rest, as we had done the night before, having first exchanged with our host our *Lapland* habits for those that were longer, and a parcel of tobacco, for the skins of 100 grey squirrels, a furr much esteemed in *Denmark* and other parts of *Europe*.

The next day our host, at our desire, provided us with sledges to go farther into the country, and the other inhabitants of the village came to see us depart, bringing brandy with them to drink to us at our taking our leave of them ; when our host having performed the same ceremony of muttering in the ears of the six rain-deer, they set off, and we were drawn with the same swiftness as before. We came to no place that was inhabited till about three in the afternoon,

ternoon, when we arrived at a village, in which were eight cottages built on a high mountain by a wood side, where our cattle stopped, by which we guessed that there were some inhabitants; but finding that nobody came to us, we baited our rain-deer with moss, which grew there very plentifully, and refreshed ourselves with salt beef and biscuit; while our interpreter regaled himself upon some rain-deer venison and dried fish, all of us making merry with the brandy we had given us in the last village.

We staid in this place near an hour, and this being the usual stage, the rain-deer had no inclination to quit it; in order to induce them to move, our guide used many ridiculous and superstitious ceremonies: he went alone into the wood, and coming out again, muttered some words in the ears of these animals, which, whether they understood or not, had but little effect on them, till he had played this farce over four or five times, when they began to proceed, though not so swiftly as before. We then asked him the reason why we saw nobody in the village, to which he replied, that it was a very common thing in that country, these dwellings belonging to the *Kilops*, a nation of *Laplanders* who often change their habitations, fly from strangers, and subsist only upon what they get by hunting. We now descended the mountain, and about nine o'clock discovered four *Kilops* at a small distance, returning from hunting in sledges drawn by rain-deer, but they turned aside, and took another way to avoid us. In
less

less than half an hour after we entered a long-wood, in which we heard terrible howlings, but saw no beast of prey. When we had passed the wood we had another mountain to descend, at the bottom of which we observed a village; thither our cattle carried us, and stopping, beat their feet before a cottage, at which the master made his appearance, and we having solicited his friendship with a piece of tobacco, he made us welcome: we supped on our provision, as our guide did on his; and then, according to custom, laid down to rest on bear skins, being sufficiently tired with our journey.

The next morning we asked the interpreter how many leagues we had travelled the preceding day, to which he replied, at least forty; but he must certainly have been mistaken, or else the leagues must not be so long as they are generally calculated, for forty of their leagues make 160 of those of *France*, each *Lapland* league being as long as a *German*. Our guide also informed us, that we were in *Muscovite Lapland*; and we bid him ask the inhabitants of the village, whom we had presented with tobacco, and been treated by them with brandy, whether they had any commodities to exchange with us for tobacco and cloth. We had some rolls of the former left, and most of our bales of the latter. The *Laplanders* replied, that they had some furs, and on our desiring to see them brought us white, black and grey fox skins, grey squirrels and sables, though not of so fine a colour as those of *Borandia*, *Samo-jedia*,

jedia, and *Siberia*. These merchandizes were what we wanted; we therefore soon agreed with them, and paid them in cloth and tobacco. When we had finished our business, we sat down to drink with them, and though they were not quite so brutal as some other of the *Laplanders*, their conversation was extremely rude and indecent. It now grew late, and we designing to proceed yet farther to dispose of the few rolls of tobacco we had left, desired our host to furnish us with sledges and fresh rein-deer.

He harnessed and prepared as many sledges as we had occasion for, upon which we departed at one o'clock, and ran with our former speed, through different and unbeaten wastes, till past six, without meeting with one habitation; when descending a hill, we observed two huts under a rock a little out of the way. Our guide told us, that they belonged to two *Ki-lops*, who no sooner saw us, than they fled with their wives and families. We travelled two hours longer, but came to no house, till we at last discovered a large village at the foot of a hill by a river side, where we arrived at eleven o'clock at night, and went to a cottage in the middle of the place, whither our cattle were pleased to conduct us. The master of the house gave us a very kind reception, made us a fire in the middle of his hut, and treated us with brandy, dried fish, and salted venison, with salt butter and milk. We were surprized at this change, for we had not before met with any salt provisions in our journey: we had already

ready

ready eat up our bread, and should have been very much put to it had we not met with such good entertainment here; our guide, however, would not taste a bit of salt meat, and was therefore obliged to live on the fresh venison he brought with him. In the morning we found they had nothing to trade with, and that they could not supply us with sledges: upon which we crossed the river, and soon reaching another village, went to the most likely house, to hire sledges and rein-deer, to carry us to *Kola*, where having furnished ourselves, we arrived there about noon. *Kola* is a large town situated on the side of a river near ten leagues from the *North Sea*, having large forests and deserts to the east, *Mourmanskeimore* to the west, and prodigious high mountains to the south. It consists of one indifferent street, the houses of which are built of wood, and very low; but are handsomely covered with fish-bones on the top, where the light enters at a hole, as in other parts of *Lapland*. The inhabitants, like the other *Muscovites*, are so jealous of their wives, that they lock them up to prevent their being seen by strangers. Our landlord took all our cloth off our hands, for which he gave us in exchange two lynxes skins spotted like a leopard's, three dozen of white fox skins, some ermines, half a dozen of wyetfras, an animal which somewhat resembles a badger, but it is longer, and has rougher hair; his colour is a blackish red, and his tail like a fox's. There being some ells of cloth above what we were to give him in exchange, he

he obliged himself to supply us with provisions for our journey back to *Varanger*, and to help us to sledges as far as the river we had lately passed. He treated us as well as he was able, and we supped and slept as we had done in other places.

The next morning when we were preparing to depart, some of the town's people enquired whether we had any rolls of tobacco left, and whether we would exchange them for skins. We replied, with all our hearts. Upon which they fetched a dozen of ermine, two white fox skins, and four lynxes, for which we gave them the remainder of our cargo of tobacco, except seven or eight rolls, which we reserved for our own use, and to pay for the hire of our rain-deer and sledges in our way back; for tobacco is more necessary than money to those who travel in this wild and unfrequented country, the *Laplanders* valuing a piece of tobacco of the length of one's finger, at above a crown piece. The Kings of *Denmark* and *Sweden* have taxed it severely, and there are collectors settled in every frontier town to gather the imposts upon it.

When we had dispatched our business, we were obliged, according to the custom of the place, to drink with our chapmen. Our entertainment every where was brandy, and it lasted till two in the afternoon, when we desired our host to get the sledges ready, which he did in a minute, packed up our furs for us, furnished us with biscuit, gingerbread, and salted rain-deer venison, besides a rundlet of brandy.

Every

Every thing being thus ready, we stored our merchandize in one of the sledges, got into the others ourselves, drank a full glass at parting with our friendly dealers, and set out on our return for the village on the other side of the river, which we had passed the day before, and in my opinion we travelled much faster than we had hitherto done.

We arrived at the first village by seven o'clock, soon crossed the river, and went directly to our old quarters, where our landlord, in hopes of getting more tobacco, received us very joyfully: he immediately presented us a cup of brandy, and asked us if we would have the rain-deer put to the sledges, to which we replied, that we chose to rest ourselves till morning, there being no village for several leagues from his habitation. Upon this he filled us another cup, and when we had drank it, offered to take us with him to the funeral of one of his neighbours who had been dead about four hours.

We were very glad of this opportunity of seeing their funeral ceremonies, and therefore accompanied him to the house of the deceased, when we saw the corpse taken from the bears skins on which it lay, and removed into a wooden coffin, by six of his most intimate friends; the body being first wrapped in linnen, and the face and hands only left bare. In one hand they put a purse with money in it, to pay the fee of the porter of the gate of Paradise, and in the other a certificate, signed by a Priest, directed to St. Peter to certify that he was a good *Chri-*

stian, and ought to be admitted into heaven: and at the head of the coffin was placed a picture of St. *Nicholas*, who was one of the seven Deacons mentioned in the *Acts* of the Apostles, a Saint greatly revered in all parts of *Muscovy*, where he is supposed to be a particular friend of the dead; upon which account his picture is always fixed near a corpse, instead of a crucifix. He is represented in a pilgrim's habit, with a long robe, a broad girdle about his waist, and a staff in his hand. They also put into the coffin a rundlet of brandy, some dried fish, and rain-deer venison for him to eat and drink on the road. They then lighted some fir-tree roots, piled up at a convenient distance from the coffin, wept, howled and made a variety of strange gestures, assuming a thousand different attitudes to shew the extravagancies of their sorrow. When this noise and these gesticulations were over, they marched round the corpse several times in procession, asking the deceased, why he died? whether he was angry with his wife? whether he stood in need of meat, drink or cloaths? if he had not succeeded when fishing, or had lost his game when hunting? they then resumed their howling, and stamped with all the signs of distraction. One of the Priests who assisted at the solemnity frequently sprinkled holy water upon the corpse, as also did the mourners. Being now almost deafened with noise, and wearied with looking on these barbarous rites, we left our landlord behind us, and returned to his cottage, where we found his wife at home. She had made a sally from the place in which her husband

husband had confined her, on our arrival, and no sooner saw us, than supposing he was in our company, would have retired to her corner; but our interpreter letting her know that the good man was at the funeral, and would not return for some time, she staid and viewed us all round, one after another, drew her seat near us, and shewed us a bonnet of her own embroidering, very curiously performed with tinsel thread. The wives of the *Muscovite Laplanders* make cloaths for themselves, their husbands, and their children, and at the edges they are all embroidered with that thread. She was pretty handsome, well shaped, and appeared to be good humoured, and well pleased with us. While our host was busied about the funeral, we pulled out some of our provisions, and gave our landlady some of every sort to taste. She liked them all, especially the gingerbread; but having drank two or three glasses of brandy, withdrew to her place of confinement, for fear of her husband's return; for he would have certainly resented her having taken such liberty, which would have raised his jealousy, had he found her among us. When he came home, he obliged us to take a cup or two more, to smoke a pipe, and to sup with him; for he brought such provisions as he thought would be most grateful to our palates, particularly salt butter, which we eat with bread; and as our guide would not taste any thing that was salt, he got him some dried fish, and some bear's flesh, which he broiled on the coals.

All the cottages in this village were, like those we had observed in other places, built of wood and covered with turf, but they were handsomer than any we had yet seen, being both within and without adorned with fish bones, curiously inlaid. We according to custom laid down with the family on bears skins, our landlady alone being obliged to conceal herself till we were gone.

Early the next morning our host got ready our rain-deer and sledges, when having stowed our bales, our cattle set off, and in two hours carried us six leagues. As we were passing between two hills, we saw a *Laplander* going a hunting, who came up to us skating on the snow, as fast as we rode in our sledges, for the snow seldom melts there till *Midsummer*. His skates, which were made of the bark of a tree, were seven feet and a half long, four fingers broad, and flat at the bottom. He was dressed like the other *Laplanders*, in a garment made of the skin of a rain-deer, had an arrow in one hand, a bow in the other, and a large quiver hanging at his back, and was followed by a black cat. He kept company with us about half a league, and we parted at the foot of the next mountain.

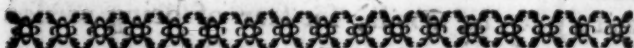
We continued our rout three days, stopping at the same places where we lay before, and meeting with nothing extraordinary; our entertainment, our way of travelling, and every thing else being the same as before: and on the 21st of May, about nine o'clock at night, we arrived safe at *Varanger*, having every where been

been received with great civility, and, suffered no injury in our whole journey.

From observing the manners and dispositions of the *Laplanders*, I am enabled to affirm, that notwithstanding their ignorance and superstition, they are remarkable for their honesty, and are unacquainted with theft or fraud. They throw the dart with such dexterity, as easily to hit a mark of the size of a crown piece, at the distance of 30 paces; and are so expert in the use of the bow and arrow, that they can shoot their game in what part they please, and yet are so averse to war, that whenever the Kings of *Denmark* or *Sweden*, or the Czar of *Moscow*, have occasion for soldiers, they leave their dwellings and fly to the woods, for fear of being pressed into the service.

They have plenty of geese, ducks, pullets, and other sorts of fowl, which they feed with the grain of which they make their drink, and when that is scarce, give them dried fish. Here is also a bird of prey, of a deep pearl colour, much bigger than an eagle: his head is like that of a cat, and his eyes are red and sparkling: his claws and beak resemble those of an eagle, and he feeds upon hares and other small game. Most of the beasts of *Lapland* are white, as the wolves, bears, foxes, and hares; even their crows may be compared to the swan for whiteness, and have nothing black about them but their bills and feet. They have a kind of dogs a foot long, and only four inches high; their hair is an inch long, of a yellowish white, rough, and standing up like a hog's bristles;

the head and snout resemble those of a rat; they have strait ears like a wolf, with a curled tail, and are very ready at catching mice, which they watch, and eat like our cats; on which account the *Laplanders*, notwithstanding their ugliness, set a high value upon them. The fish, which when dried, serves them for bread, is called *raff*, and is firm, substantial, and excepting the fat, has a very good taste. They have plenty of other sorts of fish; and though they have such an antipathy to salt, yet they boil all their meat in salt water, if they are near enough to the sea to get it conveniently.



C H A P. IV.

They sail from Varanger, and land on the Coast of Borandia; trade with the Natives, who are described; and take a trading Journey in Sledges through Borandia. They embark on board a Vessel, and sail to Petzora.

WITHIN two or three days after our return to *Varanger*, the Captain had repaired the ship, and taken in his lading and ballast; in the mean time our crew treated the inhabitants with brandy and tobacco, to keep them in good humour; for fear lest if they were not bribed to be our friends, they should, in revenge, plague us with contrary winds. We set sail from *Varanger* on the 26th of May, with
a gale

a gale as much in our favour as we could possibly desire, which the sailors ignorantly attributed to the friendship of the *Laplanders*; but this breeze soon shifting, we were obliged to cast anchor under the shore opposite the island of *Wardhuys*; when being observed by the Governor of the castle, he came off to us in a shallop, and was entertained in as obliging a manner as possible; after which he returned to the castle very well satisfied with his reception. The next day the wind settling, we proceeded again to sea, and held our course north-north-east, and in three days got into a climate where there was now no night, we never losing sight of the sun, which was always above the horizon.

On the 31st day of *May*, we saw the mountains of *Greenland*, at which time a north wind blew with such violence, that we could not keep to sea, and were obliged to steer to the east-south-east, in order to make the shore, that we might be sheltered from the weather. We continued our course for several days, and at length cast anchor in a good harbour on the coast of *Borandia*.

We had scarce entered this harbour, before we espied two ships that were at anchor about a musket-shot from us, which we found were the two ships in our company that had been separated from us in the storm that drove us into *Varanger*. We were extremely glad at finding them, and accordingly fired three guns, and hung out our flag in the stern as a signal of our arrival. They were filled with equal joy at seeing us safe, answered our guns by twice as many,

many, and hung out all their flags and pendants: we did so too; but though we wished for an opportunity of sending our long-boat to them, to learn the particulars of their escape, the wind blew so stiff, that we durst not attempt it till 24 hours after. They were no less impatient to know how we escaped, and as soon as the wind slackened, a boat came off from each of them on board us, when we embraced each other with extraordinary joy and affection, as people who had found friends whom they thought buried in the deep.

They told us that the storm drove them on the coast of *Juhorskt*, near an island, where they had like to have run ashore in three fathoms water, and were forced to tack about immediately, for fear of running upon the rocks; when by the favour of a north-northeast wind, they got out to sea with much difficulty, and in three days reached the bay where we found them. We in our turn told them the dangers we had encountered, and our being forced to enter the port of *Varanger* to re-fit our ship; and informed them of our journey through *Danish*, *Swedish*, and *Muscovite Lapland*; and of our traffic and adventures. This account encouraged them to go ashore, to try if they could find any body to trade with them; when a council being held, it was resolved, that a captain, a supercargo, two accountants, who understood both the language of the North and the *Russian*, with twenty seamen, and myself, well armed, should land, and

and take with us several days provisions, and some goods for traffic.

Pursuant to this resolution, two long-boats were got ready, and having landed, we ascended a hill, to see if we could discover my habitations; but perceiving none, we marched to a neighbouring mountain at half a league's distance, where we observed five or six persons among some bushes of thorns and briars, who came towards us, till they perceived us advancing; and then turned their backs and fled away so fast, that we lost sight of them in an instant. However, imagining that their track would lead us to some village, we followed it, and after a march of two hours, as we descended a mountain, we observed some huts in the valley below; and advancing towards them, perceived thirty or forty men armed with darts and arrows, prepared to give us battle, for seeing so strong a body of us, they took us for enemies. We halted for some time, in order to consult whether we should retreat to our ships or attack them, and being sensible that nothing was to be got by defeating them, were inclined to retire; when one of our accountants offered to go to them by himself, and to let them know that we were friends and merchants, who were come with a view of trading with them, if they had any thing to exchange with us.

This proposal being approved, he approached them, carrying two rolls of tobacco, and a small keg of brandy. When he came within hearing, one of them, who seemed to be their chief, called to him in the *Muscovite* language,

language, asking who we were, and what we would have, and on being answered that we were merchants come to trade with them, they seemed satisfied, and made signs to him to come nearer, when giving us the same signal, we, to our mutual satisfaction, joined companies.

On our coming up to them, I was surprized to see them much shorter than the *Laplanders*, their eyes are small like ferrets, and what is usually called the white, is of a reddish yellow; their heads are large, their faces flat and broad, with flat noses, and swarthy complexions; and their legs are short and thick. The *Borandian* women are not at all handsomer than the men; they dress like them, and also, like them, spend the time in fishing and hunting. Their cloaths are a cap, a jacket that reaches down to their knees, a strait pair of breeches, and stockings, all made of white bears skin, with the hairy side outwards; but their shoes are made of the bark of a tree. They roast all the meat they obtain by hunting, eat it without salt, and use fish instead of bread. Their common drink is water, in which juniper-berries are steeped, till they rot, which gives the water an agreeable taste, at least in a country where nothing better is to be had. Their huts are low and oval, covered with fish bones, and have no light, but what comes in at the door, which resembles the mouth of an oven. They drink immoderately when they can get brandy, and the most acceptable present that can be made them, is either

ther some of that liquor or tobacco: but they seem to have little or no notion of religion.

They soon purchased all the brandy and tobacco we had brought ashore with us for fox skins, wolve skins, and a few ermines. When finding that they had a great quantity remaining, we persuaded them to take them to the beach, to which they readily agreed, and having carried them to the shore, stood admiring our ships. We then made a signal for the boats to be sent off to fetch our chapmen; upon which each ship sent two, in one of which went the supercargo, the accountant who treated with the *Borandians*, and I, with several of the *Borandians*, while others staid on the sea-shore. On our going on board, the captain being informed of their fondness for brandy and tobacco, filled out a brimmer for each of them, and also made a present to each of a bit of roll tobacco of about an inch long, at which they were transported with joy.

Having purchased all the furs they brought with them, we asked if there was any conveniency for travelling in order to trade with the inhabitants, to which they answered in the affirmative; but that we must expect nothing but furs. This we let them know was the commodity we wanted, and they assured us that we might have what we would of that kind, for tobacco, brandy and money; and if we pleased, might trade as far as *Siberia*, whither they would conduct us. We accordingly agreed with them to be our guides thither and back again, and to furnish us with what conveniences

ences the country afforded in our journey, for two rolls of tobacco, and two quarts of brandy, promising them farther rewards, in case the trade turned to account, and they contributed to it by their assistance. The bargain being concluded, our captain gave them another brimmer of brandy, and sent them ashore to prepare what was proper for our journey. They soon got every thing ready, and made such a report of our kindness to them, while they were on board, that their countrymen expressed great friendship for us, and two boats were sent ashore with our supercargo to purchase for us. They were, however, at first unwilling to come aboard our ships; but we soon became better acquainted, and they came freely whenever they had an opportunity. We bought their furs, treated them with brandy, and, in return, they invited us to their habitations.

In seven or eight hours we had provided every thing ready for our journey, and our two *Borandian* guides had brought six sledges drawn by six rain-deer to the water side, which were all that were to be had in those parts. The rain-deer, however, being larger than those of *Lapland*, were able to draw two men, and the *Borandian* sledges were contrived to hold them. The captain now called a council of all the officers, and it was agreed that our supercargo, the two accountants, who could speak the *Russian* language, myself, and a seaman out of each ship, should go with the two *Borandians*. One of the sledges we loaded with tobacco, brandy, gold, silver, and copper, to the value of three

or four thousand pounds: our supercargo, and myself rode together in another of these sledges: one accountant and a *Borandian*, in a third: the other accountant and the other *Borandian*, in the fourth; two seamen in the fifth; and the other seaman in the sixth; and as he rode by himself, we stowed some barrels of brandy and tobacco in his sledge. We sat one at one end of the sledge, and the other at the other, facing each other. The rain-deer ran as swiftly as those of *Lapland*, and in eight hours time drew us twenty leagues over hills and dales, and through several woods; yet in all this great extent of country we met nobody in our way. We then stopped at a village, and baited our rain-deer with moss, while we ourselves eat some biscuit and beef, and our *Borandians* refreshed themselves with dried fish dipped in fish oil; for they would not touch our salt meat, and did not like our biscuit. Both they and we drank at a neighbouring spring, and then cheered ourselves with a glass of brandy. Being thus refreshed, we again mounted our sledges, and travelled three hours longer; when we perceived a large village at the foot of a mountain, the huts of which were better built, and closer together than those of *Lapland*, thither we hastened to take up our lodging; but were obliged to divide our company, because one of these cottages would not hold us all. We met with the same reception from our landlords as in *Lapland*, and gratified them with a piece of roll tobacco and a cup of brandy; our guides took care of our rain-deer, and we laid down to rest on bears skins.

I distinguished one part of the day from the other, by day and night, though there was really no night at all; but having slept six or seven hours we arose, in order to trade with the inhabitants of the village, who being informed of our business by our guides, soon produced some wolverine skins, white fox skins, two dozen of ermines, three hundred grey squirrels, and seven pair of fables; but they were neither so fond of tobacco nor brandy as the *Laplanders* or the *Borandians* dwelling on the coast. Hunting is their only diversion and employment. In the summer, they eat their meat either boiled or broiled on the coals, and during that season provide enough to serve them in winter, preserving it by drying it in the sun, cutting it in pieces, and spreading it on the tops of the houses, which is the only dressing they bestow upon it. They change their dwellings like the *Kilops*, are extremely stupid, and have very disagreeable features. Their white bear skin cloaths resemble those of the other *Borandians*, and are tied round their waist with a girdle four inches broad, at which hangs a stone that will cut like a razor. The only difference observable between the women, who are dexterous hunters, and the men, is that their hair is twisted, and hangs down on their shoulders, and their carrying only a stick in their hand, which is sharp at one end, and being of a tough wood, serves them for a defensive weapon. The men carry at their backs a quiver, and the strings of their bows are made of the rind of a tree.

We bought the furs the inhabitants had to sell for money, and copper; ordered our rain-deer

deer to be put to the sledges; mounted them; and having each of us drank a glass of brandy, proceeded on our journey. We now rode eight or nine hours before we came to any habitation; but at last our guides perceiving three or four huts, turned our rain-deer up to them; but finding nobody there, we regaled ourselves on our own provisions, while our cattle fed on the moss which grew there in abundance, and having refreshed ourselves and our beasts for three hours, proceeded on our journey.

We were now fifteen hours without seeing any human creature, or so much as a hut, when we overtook three hunters at the foot of a hill, one of whom was dressed after the *Musco-vite* fashion in a long robe, tied round his waist with a girdle four inches broad. It was made of a white bear's skin, with the hair outwards, and edged with a fine black. His cap was made of a black fox's skin, and his breeches and stockings of the skin of a rain-deer; his shoes were made of fish skin, and were not unlike those worn at *Varanger*. The two other persons were dressed like us, in white bear skins with the hair outwards, and carried at their backs bear skins, wolver skins, white fox skins, some ermines, and very fine fables. The former carried only 12 white crows, and seven fables, which hung at his girdle. On our coming near them, one of our guides stopt to talk with them, and to our great surprize got out of the sledge, and the other went into it. Neither the supercargo who rode with me, nor I, could tell how to account for this complaisance. We however pursued our journey with the hunter

in our company for above an hour longer thro' this desolate country, without meeting any other person, or the least sign of an habitation; but at last drawing near the brow of a high mountain, we perceived at the foot of it several houses built close together, and had a distant view of the sea. When we arrived at the village, we stopped at the door of the person who had taken our guide's place, and soon found that he was a man of authority, and he desired the inhabitants to serve us as his friends.

The name of this village is *Vitzora*. The inhabitants no sooner saw this person in our company, than they ran to help us out of the sledges, and to unharnefs our rain-deer. He bartered all his skins with us for brandy and tobacco, except his bear skins, which we did not chuse to buy, and his fables, which he durst not sell; for the Czar reserving that commodity for himself, those in any part of his dominions who sell it without a licence from him are severely punished. Officers are appointed to take these furs of such as have them, they have warehouses in several places of the empire, and are the only persons permitted to trade in that merchandize.

Having dealt with the *Borandian* gentleman for all the furs he had to sell, he sent two of his servants about the village to tell the inhabitants, that if they would bring their skins to his house, they might have brandy and tobacco for them, as their master had already had for his. The *Borandians* of *Vitzora* were glad to hear of so good a market, they immediately brought us all their furs, and we bought this in

this place above 1500 skins of all sorts, except fables; when our cargo becoming too bulky to be carried in a sledge, we desired our landlord to do us the favour to lend us his bark, and some of his servants to go in it with one of our seamen, who was a good sailor, to carry the furs aboard our ship, which lay at above 100 leagues distance; for the sailor and the *Borandian* servants who were used to the coasts might easily manage that small vessel and convey our merchandize to our companions. He readily agreed to this request, and we paid him for the use of his bark in tobacco and brandy.

This bark was built in the form of a gondola, it being broad in the middle and sharp at each end. It was entirely of wood joined with pegs, without so much as a nail in it, or the least bit of iron. In the middle it had a fir-tree mast, to which was fastened a square piece of coarse cloth made of the rind of a tree, which served for a sail; the cordage was made of the same materials, and the two anchors were formed of a very heavy kind of wood. When they were about to put to sea he privately shewed us thirty pair of sable skins, which we bought with ready money, slipped them on board, and the vessel put off immediately. This, however, was running a dangerous risk, for had there been any searchers at hand, he would not only have been corporally punished; but also he and whole family sent as slaves into *Siberia*.

The bark being out of sight, our supercargo and accountants sat down to drink with the

Borandian gentleman, while the two seamen and I walked out to take a view of the place, the situation of which was very pleasant, having two mountains on each side of it, almost a league in height. All the houses were built and artfully covered with fish bones, and the crannies every where stopped up with moss, as close as the caulking of a ship, and in some places that were most exposed to the wind, were covered with turf very neatly laid. The doors, like those we had seen in other parts of the country, were built like the mouths of ovens, and at the top of the houses were a kind of lattices to admit the light. The inhabitants were very short, and swarthy, with flat noses and disagreeable persons. All the women and children appeared industrious, for we found them busily employed, some making fishing nets of the rind of trees, others sails, which looked like fine mats, their needles were formed of fish bones. Others were employed with knives, and others again with hatchets, in different kinds of business.

As we had not yet disposed of half our commodities, and were in a country abounding with furs, we, at our return to our lodgings, consulted with our supercargo and accountants, when it was agreed, that as our commission for traffic and discovery was very extensive, we would proceed as long as we found the trade good, and our cash, brandy, and tobacco held out. Having taken this resolution, we sent our guides back with the rein-deer and sledges, and with letters to our Captains to inform them

of our success and resolution; and then, by the assistance of our host at *Vitzora*, hired a bark to carry us to *Petzora*, the capital of a principality of the same name, on the north coast of the *Muscovite* sea; our landlord was so kind as to embark with us, and by the help of an easterly wind, we coasted along the shore, and in fifteen hours reached *Petzora*.



CHAP. V.

The Author and his Company are kindly entertained at Petzora, and having purchased a great Quantity of Furrs, set out in Sledges to prosecute their Journey. They meet with five Exiles in the Woods of Siberia, one of whom is known by the Author, and gives him an Account of the Cause of his Banishment, and the Hardships endured by those poor People. The Author arrives at the Town of Papinowgorod, where he is kindly entertained by the Governor and his Lady. An Account of the Manners, Customs, and Buildings of the Inhabitants. He travels through Samojedia. A Description of the Persons and Manners of the Samojedians.

ON our arrival at *Petzora*, we waited upon the collector of the customs, who there assumes the title of Governor, and lives at the castle. He was dressed after the manner of his country, in a robe of violet coloured cloth, with a mixture of red, and entertained us with
some

some excellent metheglin, which was as racy as sack, after which we had brandy and gingerbread, the common collation all over *Muscovy*. As we knew that he had the care of the Czar's fables, we asked him to sell us some, and on his desiring to know how many we wanted, we told him we would take all he had, if he would let us have them a pennyworth. Upon this he conducted us to the warehouse, where there were five zimmers, each zimmer being fifty pair, among which there were two zimmers as black as jet, and the finest I ever saw, for which we paid him 500 ducats, and the other three zimmers we purchased for 800 crowns or 400 ducats. Having paid him his money, he gave us a noble entertainment of roasted wild fowl, young rain-deer venison, which is very good meat, and fresh fish; two boats having at our first arrival been ordered out to catch some for our entertainment. After this meal, we sat eight hours drinking brandy and metheglin, the fumes of which would much sooner have got into my head, had I not ever now and then eat a *Muscovite* biscuit, which is most excellent bread. At length, however, becoming intoxicated, the Governor and his guests all laid down on white bear skins, for he had no beds, when having slept six or seven hours, we arose, and the Governor immediately presented us with a bumper of brandy.

After breakfast being desirous of going thro' the town, in order to try whether we could carry on any trade with the inhabitants, the Gover-

nor ordered one of his officers to accompany us, and we soon bought of several people 2000 grey squirrels, 4 dozen of ermines, 500 fox skins, the greatest part of which were as white as snow, 120 white wolf skins, and 200 martens of a greyish colour. All which we purchased for 400 ducats, half of which we obliged them to take in copper money, because it incumbered us, and the other half in gold and silver. We then returned to the castle, whither we sent our merchandize, and there packed it up in bales, covered with the same sort of stuff as the sails of the bark. Having thus taken care of our goods, it was resolved that one of our accountants should return with them to the ships, for which purpose we desired the governor to furnish us with a bark, to which he agreed. We also hired three *Borandians* to assist the accountant in his voyage, the Governor passing his word for them, that they should be trusty and do us no wrong. For the hire of the bark, and the wages of the *Borandians*, we paid him ten ducats more, and gave the *Borandians* some pieces of tobacco, the Governor promising to satisfy them for their trouble, when they came back.

This vessel having set sail, we fell to drinking again, when the quantity drank by the gentleman of *Vitzora* was quite surprizing; but having continued drinking four hours together, we composed ourselves to rest on bears skins, as before.

The next morning our supercargo desired the Governor, to let us have some rain-deer, to carry us into *Siberia*, upon which he furnished

us

us with seven of them, and the same number of sledges, one for our supercargo, one for our other accountant, one for myself, two for our two seamen, one for our guide, and the other for our tobacco and brandy. He also supplied us with provisions, that were to last till our arrival at *Papinowgorod*, a city in the province of *Petzora*, on the borders of *Siberia*. Our factor having taken the money he had left, and the seven rein-deer being put to the seven sledges, the Governor ordered another to be got ready, for one of his domestics, whom he directed to wait upon us seven leagues of our way, till we arrived at a village, from whence he was to take back our rein-deer, for all which he was to have no more than four ducats. But he would not let us go without our drinking five or six glasses at parting.

Having returned our hearty thanks to the Governor and the gentleman of *Vitzora*, for their many civilities, we got into our sledges, and travelled four hours through intricate unbeaten ways, without seeing any living creature, till at last we met four white bears of an enormous size, which crossed our way, and seeing us fled into a wood. In about two hours after we arrived at a village, consisting of seven or eight cottages; but the inhabitants being all gone to hunt, we alighted to refresh ourselves on the provisions we had brought with us. In the mean time five or six men with their wives and children returned from hunting, bringing with them six bear skins, four wolf skins, a couple of ermines, and eight fables. They were surprised

prized to see us there, and would have fled, had not the Governor of *Petzora*'s servant assured them that we were friends and merchants bound for *Papinowgorod*, when coming up to us, they viewed us narrowly, being amazed at seeing so many strangers in so unfrequented a place. They were astonished at our dress, our looks, and shape, and at our speaking a language so different from theirs, which to them was quite unintelligible. However, by the assistance of our interpreter, we bought all the skins they dared to sell us, and they lent us rain-deer and sledges to carry us to the mouth of the river *Papinowgorod*.

We now left the river *Petzora*, the coast of which we had followed some time, and proceeded towards that of *Papinowgorod*, through almost impassable ways, over high mountains, and through woods and forests for three hours; but at length on our approaching a thick wood, we observed five men in white bear's skin long coats, made after the *Muscovite* fashion, each of whom had a gun on his shoulder, a pouch on one side, and a knife and sheath on the other. As they made up towards us, our guides stopped their rain-deer, when the five men being near enough to be heard, one of them perceiving that we were strangers bad us good-morrow in the *German* tongue, wishing that they were as free as we were. Our supercargo being a native of *Lower Saxony* was attracted by the sound of his own language, and asked him what countryman he was, when entring into conversation, several things were started, by which they

they understood that they had been formerly acquainted. Upon which the supercargo alighted out of his sledge, embraced him, and asked how he came there, to which he replied, that he had been banished for hunting fables, a very capital offence, for which some are sent into exile for ten years, some for six, and some for three.

While they were discoursing, I had time to look at the other four, when I imagined that I had some knowledge of one of them; but could not recollect who he was, and the more I looked at him, the more firmly was I persuaded that I had seen him before, and therefore could not forbear getting out of the sledge to satisfy my curiosity; but I no sooner set my foot on the ground, than the man who remembered me, better than I did him, ran to me and embraced me, asking in *French*, whence I came, and where I was going. This increased my surprize, since I could not yet call to mind who he was, for he was strangely altered by his habit, by the length of his beard, and his head being bald; he was besides reduced almost to a skeleton. Finding that I could not recollect him, he told me his name, and that he had often drank with me at *Stockholm*. Upon this I immediately recollected, that he was a person to whom I had been very much obliged, and had received many civilities from him in *Sweden*. He was born in *Lorrain*, was a gentleman by birth, and Lieutenant-Colonel of a regiment of *Muscovite* horse. He had endeavoured to persuade me to go with him to *Moscow*, by offering

offering to procure me an honourable and profitable post ; but I declined accepting his proposal. When I compared the fine appearance he made at that time, the respect with which he was treated, as well on account of his estate, as the place he enjoyed, and his bearing the character of a man of honour and bravery, with the miserable condition to which I now saw him reduced, I could not help being afflicted; I embraced him with extraordinary affection and tenderness, and asking the cause of his disgrace, he replied, that the Czar suspecting that he had not been so zealous in his service as he ought to have been, had banished him to *Siberia* for three years, where he endured miseries that are not to be expressed, he being exposed to the greatest dangers in hunting wild beasts for his subsistence, to the miseries of hunger and the rigour of the seasons, which he and his companions were forced to endure, nobody daring to afford them any relief. He added, that they were almost every day attacked by wild beasts, which they met in herds seeking for pasture, and that they frequently found great difficulty in defending themselves ; that besides they were condemned to supply the Czar's officers with a certain number of fables, under the penalty of being severely lashed with a whip of leathern thongs, on their naked backs, till they were covered with blood.

One of the other had been Receiver-general of the Czar's revenues in one of the provinces, another had been a Major-General, and the fifth a man of note. They all joined in de-

ploring their misfortunes, exclaimed loudly against the Czar, and declared that when once their time of exile was expired, they would get far enough out of his power.

We now sat down with them on the moss, took out the best provisions we had, and desired them to partake with us, we even offered them our assistance to facilitate their escape; but they told us it was impracticable, they being known to all the Governors of the forts and places through which they and we must necessarily pass, and in case they should be taken, both they and we would be put to a most cruel death. This increased our concern for these unfortunate gentleman, and we all shed tears at the sight of what they suffered, and the ideas of what they were still to endure. We could not think of parting immediately with persons in such a disconsolate state, some of whom we had known in better days; we therefore told them, our trade was not in such haste as to prevent our spending a day or two with men in their unhappy circumstances; whom we equally loved and esteemed. They received this proposal with great joy, told us they had five little huts which they had built in the neighbouring wood, and if we would be so kind as to go thither with them, they should be infinitely obliged to us, and all the skins they had should be at our service, except the fables, which they were forced to reserve for the Czar; and added, that the remembrance of the happy hours they should spend with us in their solitude, would make many future months

months glide on the more sweetly. We therefore ordered our guide to unharness their rain-deer, and to convey our goods into the huts the gentlemen had erected to defend them from the weather.

We found, on approaching these huts, that necessity had rendered these unhappy men ingenious. They were built of fir, higher than any we had seen in our travels; there were two or three rooms in each of them, and lattices to let in the light at the sides. They were each shaded by trees, and so artfully paved with fish bones, that the floors looked as if they were inlaid with ivory. To secure themselves from the wild beasts, they had dug a trench round these buildings, and pallisaded the inside of it with strong posts, and pieces of wood nailed across them, on the top of which were spikes of fish bones. Thus when their gate was shut, they were as secure as in a fortified place. They had within all sorts of hunting and fishing tackle, besides a good store of salted rain-deer venison, biscuit, and metheglin.

While the rest of the company sat down to drinking, my friend and I withdrew to his hut to converse together. We entered into discourse on his adventures; he told me he intended to return home after his time of exile should be expired, and gave me his direction in *Lorraine*. Our conversation turned partly on our former acquaintance, and partly on the wildness of the country, and the barbarity of its inhabitants.

When my friend and I had tired ourselves with talking, we laid down upon bear skins, as our companions also did when wearied with drinking, and slept sound till the next morning.

We arose early, and at the desire of the five banished gentlemen, took each of us a gun, and went with them into the woods to examine their snares, to see what prey was caught in those they had laid the night before. We killed among us ten or twelve white foxes, and half a dozen grey martens, but met with none of the larger game; and as we resolved to pursue our journey in the afternoon, we did not chuse to lose our time in hunting. We therefore soon returned to the huts, and both we and our hosts, furnishing provisions, refreshed ourselves as well as could be expected in so wretched a place. After we had drank plentifully, the gentlemen forced us to take seven bears skins, ten white fox skins, two pair of ermines, and eight wolf skins, for which they would take no money. However, we with difficulty prevailed on them to accept some brandy, tobacco and cloth, which we took care should exceed in value the commodities they had given us. We wept reciprocally at parting, wishing them patience to endure their sufferings, and a happy deliverance out of them; and having mounted our sledges, continued our travels with the usual expedition.

Having now proceeded three hours without meeting with any habitation, we discovered five or six huts together, in which were about
a dozen

a dozen persons, from whom we bought all their skins. We now following the course of the river *Petzora*, frequently met with small villages, in some of which we found inhabitants, and in others none; but whenever we met with any body to trade with us, we bought their furs either with money or brandy.

We now reached a large ridge of mountains, that are almost always covered with snow, and so barren, that neither man nor beast can live upon them. On both sides of these mountains were vast numbers of white bears and wolves, which put us in fear of our lives; we being under continual apprehensions of their falling upon us, though perhaps these animals were as much terrified at us, as we at them; for they fled before us, some on the one hand and some on the other, frightened perhaps at the glittering of our arms. We were twelve hours in crossing the mountains, over which our cattle had much ado to draw us; but we at last reached the descent, and arrived at a village in *Siberia*, where the people had linen shirts, close buskins, and garments of bear skins, with the hair outwards; but they appeared to be less barbarous than those with whom we had lately conversed. They received us very civilly, asked whence we came, and whither we were going: having resolved their questions, we bought all their skins for ready money, feasted with them on dried bears and wolf's flesh, rice cakes, and brandy; and then slept upon bears skins, in houses built after the manner of the *Laplanders*.

We no sooner awaked than we mounted our sledges, and set forward for *Papinoiwgorod*, which we reached in about twenty hours. The Governor hearing of our arrival, sent for us to come to his castle, to inquire into our country and business. Upon which we immediately waited on him, and our accountant, who understood the *Muscovite* language, answered all his questions to his satisfaction. Being informed that we were *Danish* merchants who travelled so far to buy furs, he treated us in a very friendly manner; and, as a mark of respect, sent for his wife to entertain us, upon which she came with a bottle of brandy in one hand, and a silver cup in the other, followed by a maid servant with a plate of gingerbread. We saluted her according to the custom of the country, by bowing our heads, when untying the knot of her shift-sleeve, she let it fall to the ground, and the supercargo taking it up, we each of us kissed it. She then furled it up again with her left hand, and taking the bottle and cup, which she had set down to perform this ceremony, gave each of us a bumper of brandy and a piece of gingerbread, standing all the while near her husband at the end of the table. She then withdrew, and the Governor regaled us with an excellent supper.

This entertainment being over, we were conducted to lodgings prepared for us in the castle, and considering the country, lay in very good beds. Having slept about seven hours we arose, of which the Governor being informed by one of his servants, got up and
came

came to see us, bringing a bottle of brandy with him, and one of his domestics having another, filled a large cup for a morning's draught. We each of us drank one, and then the Governor asking if we would buy his skins, our supercargo said that he would if he liked them, and could agree on the price. His furs were extremely well chosen, and though they were valued much higher than any we had met with in all our travels, they were the best worth our money. These being bought and paid for, he ordered one of his men to call some of the inhabitants, who had a quantity to sell; and while our supercargo was dealing with the Governor and his neighbours, I took a turn about the town.

Papinowgorod is commodiously situated in a small plain, in the midst of a fruitful country, surrounded with high mountains; and near it runs a large river, well stocked with fish. The houses are low, and meanly built of wood, with the chinks stopped with moss, and the streets are paved with timber laid close together. The people of fashion wear a long cloth coat, which reaches down to their toes, with very close sleeves of another colour, under which they have breeches and stockings of the same cloth. Their shoes, or rather boots, are of blue, red or yellow leather, buttoned on the top; and upon their heads they wear cloth caps lined, and bordered with ermine, sable, or black fox skins. The women are fair, beautiful, and somewhat fat; their hair is of a light chestnut colour, hanging down to their waist,
and

and their head-dress is an oval cap: their upper garment, like the men's, hangs down to the feet, and is made of a red, blue, or violet coloured cloth, and is lined with white fox skin or sable. They have round their waists a broad girdle adorned with pearls, and their shifts are made of fine callico, with sleeves all ruffled up from the wrist to the shoulders, some of which are five ells long; and this bundle prevents their using the arms of their robes, which therefore hang useless, and are only pinned on. On their feet they have shoes made of *Russia* leather.

The people of *Siberia* are grave, robust, swift, and very dexterous at shooting with the cross-bow; but they are ignorant, churlish, and jealous of their wives, whom they generally lock up; and even if they do not, none of them dare quit their rooms without their husband's leave. The religion of this province is called *Nicholation*. Their judical proceedings are terminated with great expedition; for all their courts of justice are courts of equity. There are no petty-foggers either here or in *Russia*, who, under the pretence of relieving the innocent, and succouring the distressed, rob the poor, and enrich themselves with the spoils of the widow and the fatherless. False witnesses are most severely punished, as are also traitors and robbers; murderers are prosecuted by the friends of the deceased, and adultery in either sex is punished by stoning the guilty to death.

When

When we had bought up all the furs we liked at *Papinowgorod*, we found we had enough to load a sledge and a half; and having still some tobacco and about 5000 ducats left, our supercargo resolved to proceed farther, in order to purchase more for us, and to return to our ships through *Samojedia*. As our brandy fell short, we bought a supply of the best the Governor had; we agreed with him for provisions sufficient to last us twelve days, and for rein-deer to carry us to the end of our journey. When we had concluded all our dealings with him, and paid our money, we were forced to have a drunken-bout at parting, without which there is no getting away. We eat and drank for ten hours together, and then took our rest for eight more: after which we arose, harnessed our rein-deer, loaded our sledges with our merchandize and provisions, mounted them, and took leave of the Governor.

We proceeded seventeen hours, all the way buying up what furs we could find of the *Siberians*; and having in six hours more crossed the *Riphean* mountains, we entered *Samojedia*, a desolate mountainous country, full of juniper trees, pines, and firs. It abounds in moss as well as snow; and we every moment, to our no small terror, met with white bears, wolves and foxes.

On our ascending mount *Stolphen*, whence arises the river *Borsagatz*, we came to eight or nine houses, where we stopped, in order to rest ourselves and our cattle, and exchanged
with

with the inhabitants brandy for white and black wolf and fox skins, castor and otter skins. They had several dozen of fables, which they would not sell upon any terms, though they were assured by our *Borandian* guide that there was no manner of danger, we being traders who were going to our ships, and could not be discovered before we reached the coast, because we were not to pass through any place where there were officers impowered to search for prohibited goods. All our arguments had, however, no effect, till we had drank them down; when our brandy rendering them courageous, they brought out their fables, and sold us the best and the greatest quantity we had picked up in our whole journey.

We staid to rest ourselves in one of the chief huts of the village. The master of the house, with his wife and children, and we his visitors lying all together on bear skins. Having slept four or five hours, I was awakened by the noise made by our host to raise his family, all of whom went out, when having the curiosity to follow them at a little distance, I observed them fall down on their knees behind the cottage, lifting up their hands and eyes to adore the sun.

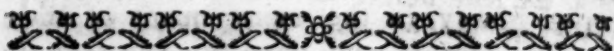
The people of *Samojedia* are shorter and thicker than either the *Laplanders* or the *Borandians*. They have large heads, their faces and noses are flat, they are of a swarthy complexion, and have scarcely any hair. They wear a round furr cap; and a white bear's skin coat, that reaches down to their knees, and is fastened round the

the waist with a girdle four inches broad; they also wear breeches, shoes and stockings, made of the same skin with the hair outwards, and instead of a cloak, they hang a black bear's skin over their shoulders, the feet dangling at the four corners; this skin is placed more on the left side than on the right, to leave the right arm at liberty in the management of their bows and arrows, and upon this skin they tie their quiver. They also wear upon their feet a kind of skates two feet long, with which they slide with prodigious swiftness over the snow, that almost always lies on the mountains.

The *Samojedian* women, have more disagreeable persons than those of the men. They are capable of enduring great hardships, and take care to breed up their children in using their bows with great dexterity. They are dressed like the men, only their upper garment is a little longer, and all the difference in their head-dress is, that the women have a lock of twisted hair, hanging down on their shoulders, at the end of which is a knot, formed of a long slip taken from the bark of a tree, which hangs down as low as their heels, and this is all their finery. They hunt as well as the men, and are in the same manner armed with bows and arrows. The husbands are true to their wives, and the wives to their husbands, and if either man or woman is found guilty of adultery, the criminal is immediately stoned to death.

Having traversed *Samojedia*, and exchanged away our money and goods for skins, we returned, and in twelve days after our departure from

from *Papinowgorod*, reached the coast of *Borandia*, without meeting with any adventure worth notice. Upon that coast our ships had waited for us, at an appointed place, where we put all our merchandize on board, paid off our *Borandian* guide and embarked.



CHAP. VI.

The Author sails to Nova Zembla. An Account of the Sea-horse Fishery in the Streights of Weygats. Some of the Crew land in a small Island in those Streights, and catch a Number of Penguins : Four Zemblians taken : A Description of their Persons and Dresses.

HAVING weighed anchor, we sailed from the coast of *Borandia* with a fair wind, and the next day in the afternoon, cast anchor near the coast of *Zembla*, when we observed upon the shore, about 30 persons with quivers on their backs, worshipping on their knees the setting sun. Our master and supercargo immediately consulted what course it would be proper for us to take to come at the speech of them. They thought them more wild than any savages they had yet seen, and thinking it would be difficult to persuade them to deal with us, it was resolved to send out three long-boats with ten men well armed in each, that they might be able to defend themselves, in case they should be attacked. I was one of the
number

number dispatched upon this service ; but when we were about a quarter of a mile from the land, the savages arose from their knees, discharged their arrows at us, and then fled with surprizing swiftness, but being at a great distance when they let fly at us, they did not do us the least harm.

We no sooner reached the shore than we landed, and pursued them to the place whither we thought they had fled, in hopes of making some of them our prisoners ; but we found it impossible, though we followed them till we approached some mountains covered with snow. However, we continued to advance farther into the country, till we came to a rising ground, upon which was erected a piece of wood very wretchedly cut into the figure of a man, and before it two *Zemblians* on their knees, with their arms lying by them. They were worshipping this idol, who was called *Petixo*, as the others on shore had been adoring the sun ; but the moment they beheld us they fled into an adjoining wood of firs, and as night approached, we thought it would be in vain to pursue them, and therefore returned to the ships.

From thence we steered towards the streights of *Weygatz*, to catch sea-horses, and having proceeded about six leagues, kept near the shore, and put out our long-boats, with eight harpooners in each besides the rowers. We were three days without catching any thing ; but at last observed two great fish approaching us, one of which had a large horn in his forehead,

head, when the boats coming near, the harpoons were thrown at him on all sides; and the ropes to which they were fastened let lose, after which the men hastily retired, to be out of his reach while he was struggling. At last the fish swimming above the water, which was a proof of his weakness, the men in the boats drew him to them by the ropes fastened to the harpoons, and then cutting off his head, threw the body into the sea; it being neither fit for food nor oil. This was a sea-horse, which is taken only for the sake of his teeth and horn, the former being more valuable than those of the elephant, because they are whiter and not so apt to turn yellow. The horn of this sea-horse was ten feet long, and very heavy; from the root, which was as thick as a man's shoulder, it gradually decreased, wreathing handsomely, till it ended in a sharp point. One of the boats coming too close to the other fish, in order to make sure of it, and not retreating with sufficient speed was unhappily overturned by his tail, with which he lashed the boat with prodigious fury, on his feeling the harpoon; by this means two of the men were drowned, notwithstanding which the fish was taken; but though this was no recompence for the loss of our sailors, yet it was a good prize, the teeth being larger and whiter than the former.

We were four days cruising about before we met with any more, and were preparing to change our station, when we perceived four of the same fish, that seemed larger than those we had caught; three of them we took, but none

of them had any horn. Twelve hours after we discovered five more, but three of them escaped, one of which had a horn. Two hours after we espied three more, one of which we took, each of whose great teeth weighed 29 pounds. Two days after we caught five more, among which was one with a horn, like that of the first we caught, but it was neither so heavy nor so large, it being scarce seven feet long.

We staid there five days longer; and in perceiving no more fish, took the advantage of a north-north-east wind to sail towards *Waygatz*, in hopes of passing those streights, which if practicable, would shorten the passage to the *East-Indies* by three fourths. We pursued our course pretty well for 36 leagues; but were unable to proceed any farther on account of the large pieces of ice that opposed our passage, and those mountains covered with snow which lie at the mouth of the *Frozen Sea*, and are known by the name of the *Pater-nosters*. Hence these streights have received the name of *Weygatz*, which signifies impassable.

We now came to an anchor on the eastern coast of *Zembla*, when one of the seamen landing, a bear came behind him and struck him down with his paw, and had we not happily seen it, and shot the bear dead, he would certainly have been devoured. This accident deterred the rest of the mariners from venturing on land.

Shortly after three bears swam to the sides of the ships, and strove to come on board; but though we cut off the paws of one of them

with our hatchets, and shot the other with a musket, the third, while we were dispatching these, mounted the side of the ship, and got upon deck, when a sailor who was near, cried out, for the bear was just at his heels; but we all took up the first offensive weapons that came to hand, as oars and pieces of timber, with which we knocked him down and dispatched him, while others shot at and killed two others that were swimming towards us. This slaughter we thought would have hindered any more attempting to board us, but we were mistaken; for about four or five hours afterwards, 10 or 12 more came as far towards us on the ice as they could, and then took to the water making directly for the ships, when we used our arms so successfully that not one of them escaped. However, many others still approaching from the high mountains, and being unwilling to continue exposed to such hourly attacks, we weighed and stood over to the west coast of *Zembla*, where we first anchored, and got clear of the streights of *Weygatz*, with an easterly wind in fifteen hours; but not without great danger of running upon the rocks of ice that lay in our way.

There is an island at the mouth of this streight which appeared very green, and is covered with fir and juniper-trees. Some of the sailors going on shore saw a bird so large as to be scarcely able to fly, and giving at their return an account of what they had seen, I deferred leave to land with about 40 men to hunt these birds and make discoveries, which being granted,

granted, we killed about 60 of them, some of which we shot, and others we knocked down with clubs, and afterwards carried them on board. These birds, which are not much taller than swans, though a great deal larger, are called penguins. They have a sharp beak, under which begins a gullet, that reaches down to their breast in the form of an urinal, only it is larger, and in this bag they store their provisions, which they take out to eat as they have occasion. They are of a brown colour, and have webbed feet like a goose. Their flesh is extremely palatable, and tastes like that of a wild-duck, only it is fatter. We eat heartily of it, and had not such a feast in all our voyage, but before we dressed them we were obliged to take off the skin which is very tough.

Having staid at this island two days, we sailed with a south-east wind; and in about 30 hours arrived at a cape, near which we again found the *Zemblians* worshipping the sun.

As his *Danish* Majesty was very desirous of having a perfect account of the riches and nature of *Zembla*; and for the more easy acquiring of that knowledge, had ordered our officers to bring off some of the natives, we resolved, if possible, to put this order in execution; and 30 persons, of whom I was one, were ordered to land in the long-boat; but we had scarcely got over the ship's side before we discovered a *Zemblian* in his boat about half a league off land, who seeing us make towards him, rowed so fast that it was impossible to get

up with him, and as soon as he set his foot on shore, throwing his boat upon his shoulder, ran so swiftly, that we perceived we should find it very difficult to overtake him, nor did he seem encumbered either with his boat or a dart he had in his hand. We, however, landed and pursued him towards a hill which we saw him mount, and he was quickly out of sight. We therefore gave over all thoughts of taking him, but as we were rowing back to our ships we perceived two *Zemblians* further out at sea, and they observing us at the same time, rowed towards the promontories and rocks on the coast to hide themselves; but we plied our oars so briskly, that we surrounded them in four boats as they were rowing with all their strength towards a rock, when finding no possibility of making their escape, they set up a howling that was the most hideous I had ever heard. They were a man and woman dressed in cloaths made of the skin of the sea-calf, with the hair outwards, and their waistcoats were formed of two skins joined together, the tails dangling, the one before and the other behind, almost as low as their knees. Their drawers were very strait. The man seemed to be about 50 years of age, and though he had no hair on his head, he had a round beard of a chesnut colour. The woman, who seemed to be about 30, had her ears and nose bored, and pendants of blue stones hanging at them; her hair was twisted, and dangled on her shoulders. Their features were extremely disagreeable, and they were both of them shorter and squatter than either the *Laplanders*,

landers, Samojedians, Borandians or Siberians. They had squeaking voices and stinking breaths, the latter was probably caused by their eating of flesh without salt, or fish with train-oil.

We soon took them into one of the boats, and towed that in which we found them, by fastening it to one of our own boats. It was made of the rib bones of fishes, very artfully joined, and neatly covered with fish skins sewed together. It was sixteen feet in length, and two feet and a half broad. They were shut up in it as high as their waists, by having a fish skin drawn over it, with two holes that fitted their waists; so that a drop of water could not get into it. They therefore exposed themselves in the foulest weather, to all the dangers of the sea; without the least fear of foundering. But though we made all the friendly signs we could to them, in order to induce them to let us know their habitations, it was impossible for us to learn any thing from them.*

We now resolved to try whether we could not get some other of these people into our power, who were less stupid and more communicative. Upon which 30 of us landed again, taking several days provisions with us, and went in two companies well armed about 100 yards distance from each other, and having hid ourselves in caverns under the rocks, posted

* It evidently appears that those people are of the same race with the *Eskimaux* of *Hudson's Bay*. See *Ellis's voyage to Hudson's Bay*, Vol. X. from P. 207 to 213.

centinels in proper places, to discover if any savages approached, whom we intended to seize and to force them to shew us their habitations. We were two days without seeing any of the natives; but at last one of our centinels gave us notice that two of them were descending a hill towards the sea-side, on which we divided ourselves into companies at proper distances, and the poor *Zemblians* soon entered the snare, without suspecting any treachery, till one of our companions discharging his fuzee, we all made our appearance, and the savages finding it impossible to fly, were easily taken. Their garments were of penguins skins with the feathers outwards. They had each a pair of strait breeches which reached to their knees, a kind of waistcoat, the sleeves of which reached only to their elbows, the rest of their arms being naked. The feathers were picked from their waistcoats before and behind. They had caps in the form of a sugar-loaf, and stockings made of the skin of a sea-calf with the hair outwards. Though their dresses were the same, yet we soon perceived that one of them was a man and the other a woman. The man seemed to be about 24 years of age; his face was very broad, his nose flat, and his complexion swarthy. He had neither beard on his chin, nor hair on his head; at his back hung a quiver filled with arrows; on his shoulder he carried an ax, and in his other hand held a bow. The woman seemed to be about 20, and held a dart in her hand; her hair hung down in two twisted locks on each shoulder; she had
blue

blue streaks on her forehead and chin, and her ears and nostrils had holes bored in them, in which were fish bone rings, to which were fastened blue stones, those in her ears being as large as filberts, and those in her nose no bigger than peas.

We tried all the ways we could think off to oblige them to shew us where they dwelt, but without effect. They were as resolute and fullen as those we had taken in the boat, and we carried them on board without making any further discoveries. When we brought them to their fellow prisoners, we found that notwithstanding their being so differently dressed, they knew each other. These four *Zemblians* seemed the most despicable part of the human species I had ever seen. Their features were extremely disagreeable, and when they walked they waddled like ducks. We could never make them eat any bread, salt meat, or fish, nor drink any beer; they being used to drink nothing but water; they sometimes tasted our brandy, but had a great aversion to the smell of tobacco. The wood-work of their bows and darts was very heavy, and of a red brown colour, but that of the arrows was much lighter and paler. Their needles, the points of their darts, arrows, and all their other sharp instruments were made of fish bones.



C H A P. VII.

The Author sails to the Coast of Greenland, lands in Iceland, and ascends Mount Hecla, where he is exposed to great Danger by an Irruption of that burning Mountain. Other Curiosities in the Island described, with some Account of the Inhabitants. The Author sails on his Return to Denmark, and arrives at Copenhagen.

THE summer was now far advanced, it being the latter end of *August*, and the cold increasing, we began to think of returning home, and therefore weighing, held on a south-west course, but the wind shifting to the southward, obliged us to make the coast of *Greenland*, where we dropped anchor, near a *French* and *Dutch* fleet employed in the whale fishery. The ships seldom lie far from the shore, for the whales which, are caught in the same manner as we took the sea-horses, are like them commonly found near the land. When they are caught they are cut to pieces, and the blubber being taken out, is put into large kettles, and melted to oil in huts erected for that purpose along the sea-shore. During our stay here, I saw one whale that yielded 350 pounds weight of good bone, which together with its oil, must have afforded a considerable profit. Our arrival in this place proved very fortunate for our *Zemblian* prisoners, who had for some time pined

pined away for want of whale oil, they being able to eat nothing, unless it was soaked in it, and our store was intirely exhausted : but for their sakes we here took in a fresh supply.

Having staid two days on this coast, we took the advantage of a north-east wind, and proceeded on our voyage, but being overtaken by a storm, we steered to the coast of *Iceland*. On our approaching that island we heard a dreadful noise at land, like the firing of several pieces of ordnance, after which we saw flames issue in abundance from mount *Hecla*. We found so many rocks on the coast, and the sea was so extremely rough, that we were afraid of venturing within a league of the land ; but we steered to cape *Heri*, under which we anchored in safety.

Soon after a strong party of us landed at the village of *Heri*, whence we proceeded to *Kirkebar*, a large town, where we met with eight or nine *Danish* merchants, who were much surprized at seeing us there, and entertained us very cordially with dishes of fresh meat, good bread, and excellent wine. From them we learned, that the day before the island had so terrible an earthquake, that they expected to be swallowed up alive.

Our Captain, supercargo, and others of our company intimating to the chief merchant at *Kirkebar*, that they were desirous of seeing whatever was worth notice in the island, he very obligingly ordered horses to be got ready for all of us, that were willing to travel into the country, and I saying that I would make

one of them, eight of us mounted, while the rest having less curiosity, chose to stay and drink at this merchant's house. This gentleman gave us one of his servants, and two *Icelanders* to be our guides, and also furnished us with a horse-load of provisions. We travelled two days in rugged and unfrequented roads; when we found ourselves about five miles from mount *Hecla*, and perceived the ground strewn with ashes and pumice-stones, over which we passed to the foot of the mountain, the weather being now very serene and calm, and seeing no flames issue out of the volcano, we resolved to go up to the top; but we being informed by our guides, that if we went farther, we should be in danger of falling into pits, where we might be suffocated with the fumes, caused by the fire in the bowels of the earth, and that it would be impossible to pull us out, all our company except myself, declared against proceeding: but I told them, that if they would stay for me, I would go up alone, and they promising that they would, I alighted and prepared to ascend the mountain, when one of the *Danish* merchants whom we met at *Kirkebar*, and who accompanied us out of curiosity, said he would go along with me.

Having given our horses to our guides, who staid behind with the rest of our company, we boldly ventured forwards, resolving to reach the top of *Hecla*, and in a short time we saw a large flight of crows and vultures, that had their nests in the top of the mountain. When we had ascended about half a league we felt the ground

ground shake under us and heard a terrible noise in the bowels of the earth, which seemed ready to burst open. At the same time there appeared on all sides chinks, out of which issued bluish flames, that had a strong suffocating smell of burning brimstone. This made us turn back, for fear of being burnt to ashes. But we had scarce proceeded 30 yards back before a black cloud of smoke ascended out of the mountain, obscured the light of the sun, and covered us so thick that we could not see each other. Our fears encreased every step we took ; for behind us came flames of fire, showers of ashes, and pumice-stones that fell as thick as hail, and this dreadful storm was attended with horrible noises. We besides every moment expected that the earth would open and swallow us up, which added wings to our flight, and we ran as fast as we were able, to escape the danger to which we had exposed ourselves by our idle curiosity ; and indeed our fears made us so nimble, that in a quarter of an hour, we got to the bottom of the mountain.

Our companions on seeing us come down so fast, burst into a fit of laughter, which was soon increased by their observing us to be as black as if we had been covered with soot ; their mirth, however, soon abated, for on our approaching them, we both dropt down speechless. They immediately came to our assistance, and by rubbing our temples, nostrils, and hands with vinegar, brought us to ourselves, and then revived us with a cup of canary ; upon which recovering our strength and spirits,

we related what had happened, and they were rejoiced at our escape.

We now left the foot of the mountain in order to see two springs at ten or twelve miles distance from the mountain, one of which is always boiling, and the other so cold, that it is said to turn every thing put into it into iron. When we had proceeded about 100 yards from the foot of mount *Hecla*, we found a pumice-stone as large as a hog'shead, which had been lately thrown out of the volcano; when our guides seeing us astonished at its prodigious size said, they had seen several much bigger, which ten men could not stir; and that instead of flames, ashes, and pumice-stones, the volcano sometimes cast up water, at others nothing but flames, and at others again, nothing but ashes or stones.

After three hours riding we drew near to the springs, which are thirty yards distance from each other. We came first to the cold one, when putting in a small cane I had in my hand, I was surprized on taking it out again to see the end which touched the bottom metamorphosed into iron.* From thence we went to the boiling fountain, from which we saw a number of what appeared to be fowls of a red colour, and about the size of ducks, playing in the water; when being pleased with the novelty of the sight, we stood for some time look-

* The author's mistake probably arose from the cane being incrustated with a stony concretion resembling iron rust.

ing at them, but on our approaching nearer they dived to the bottom, but we had no sooner left it, than they appeared again playing up on the surface. Our guides informed us, that they always continue upon the water when nobody is in sight, and constantly dive to the bottom as soon as they see any person approach.

From this spring we travelled to the sea-side, within half a league of which we heard disagreeable sounds, that were not unlike the cries of persons complaining. Our ignorant guides, who were natives of the country, would fain have persuaded us, that they were the lamentations of the damned, who, when the devil had roasted them in the flames of *Hecla*, cooled them by plunging them amongst the ice on the coast; and that they were thus alternately tormented, by making them feel the extremes of heat and cold. But though we gave no credit to this *Iceland* tradition, we resolved to see those shoals of ice, which bound that part of the island and no other. These we were told by our guides come upon the coast in *June*, and go away in *September*. On our arrival at the coast, we found that these imaginary complaints were only occasioned by the agitation of the ice and water driven violently against the rocks by the wind.

Having seen all that was worth observation, we returned to *Kirkebar*, where we arrived on the 16th of *September*, and having staid a few hours in the town, went on board, when we found the Governor of the island, accompanied

by the Bishop of *Sceltholt*, who, hearing that we had been at *Zembla*, came to see our ships, and to discourse with us.

As *Iceland* abounds in rich pastures it produces great plenty of all sorts of cattle, and the beasts that feed in these pastures are so fond of an herb called *caitophe*, that the inhabitants are forced to prevent their eating too much of it, for fear they should burst themselves; but though the fields look green and pleasant, yet the north-east wind, which blows here with great violence, is so very cold, that no wheat, or any other grain fit to make bread will grow there, for it either kills the seed, or the corn while it is green.

The *Icelanders* for the most part dwell in caverns hewn out of the rocks, and the rest live in huts built after the manner of those in *Lapland*, some with wood and others with fish bones, covered with turf; and both they and their cattle lie under the same roof. Their beds are composed of hay or straw, upon which they lie in their cloaths with skins upon them, and make but one bed for the whole family. Both the men and women have very disagreeable persons; they are swarthy, and dressed like the *Norwegians*, in coats made of the skins of the sea-calf with the hair outwards, with no other linen than sack-cloth. They live by fishing, and are very nasty. [The food of the poor is very coarse, it consisting of a sort of stock-fish pounded with a stone, very bad butter and cheese, and no other drink but water, milk or whey; yet on this hard fare many of them are said

said to live without the help of a physician, to a hundred and fifty years of age.] Most of them pretend to witchcraft, and are said to worship the devil under the name of *Kobald*, who it is pretended frequently appears to them under a human shape. They have also a kind of household God cut out of a piece of wood with a knife, who is extremely hideous, this idol they adore privately, and hide it for fear of the *Lutheran* Ministers, who endeavour to instruct them in the principles of Christianity.

Three days after our coming on board we took the opportunity of a north wind, and set sail. We continued our course to the south-south-east, and at length happily arrived at *Copenhagen*, where having saluted the castle, we dropt anchor, and went ashore.

His Majesty being informed, on our entering the city, that we had brought some *Zemblians* with us, commanded us to bring them to court, which we immediately did, every body gazing at them as if they had been born in another world. The King himself admired the oddness of their dress, and the strangeness of their figures. He ordered the steward of his household to give directions for their being kept with care, well provided for and taught the *Danish* language, hoping he might then get something out of them, relating to their country, that would be beneficial to his own. He commanded us to give him an account of the several places we had visited, the manners of the people and their way of living: and having given his Majesty full satisfaction with re-

spect to all he desired to know, we went to wait upon our owners, in order to inform them of the markets we had met with, and what returns we had brought home, which proved highly to their advantage. Our ships were ordered up to *Christian Haven* in order to be unladen, which was done in two days time, when one of the chief merchants of the company presented the King in the name of the rest, with the two horns we had taken from the sea-horses, and his Majesty received them as rarities of inestimable value; and believing that they were really the horns of the unicorn, he gave orders for their being deposited in the treasury chamber, and in return promised to grant the company as many privileges as it was in the power of his prerogative to bestow. The merchant who presented the horns was rewarded with a chain of gold with his Majesty's picture hanging to it, and with a licence to trade custom-free for a certain term of years.



THE
T R A V E L S
O F

Monfieur M A U P E R T U I S,
And his ASSOCIATES of the ROYAL
ACADEMY of SCIENCES.

Made by Order of the FRENCH KING, to de-
termine the Figure of the EARTH at the
POLAR CIRCLE.



C H A P. I.

*They attempt to make their Observations on the
Coast of the Gulph of Bothnia; but are disap-
pointed. A Description of several Mountains,
Woods, and Rivers in Lapland, in Summer. A
Mountain on Fire.*

I N order to give a clear idea of this under-
taking, it is necessary to observe, that the
great Sir Isaac Newton and Mr. Huygens had
from different observations concluded that the
earth

earth was flatted at the poles; but upon measuring the whole area of the meridian that passes through *France*, and from other operations, it was concluded by several of the members of the academy of Sciences at *Paris*, that the terraqueous globe was prominent at the poles. Hence the members became divided in their sentiments, and perplexed by their own enquiries, upon so important a subject, that was justly considered as having a real influence upon Astronomy and Navigation. To put an end to this dispute, the *French King* resolved that it should be finally decided, and to the great joy of the academy, an order was dispatched from court for a certain number of the members to go and measure the first degree of the meridian at the equator. These, says *Monf. Maupertuis*, set out a whole year before us. The rest were commissioned northward to measure the remotest degree they could reach. And the same alacrity, the same zeal to serve their country appeared in those who were to endure the rage of the equator suns, and those that were to freeze beneath the Polar Circle. The travels in the north were wrote, as hath been already hinted, by *Monf. Maupertuis*, and we shall give them in his manner.

The company destined for the north; says he, was composed of four academicians, *Mess. Chiraut, Camus, Le Monnier*, and myself; the *Abbe Outhier*, and *M. Celsus* the celebrated professor of astronomy at *Upsal*, also assisted at all our operations, and their abilities and advice were of singular use to us.

No sooner was the vessel that carried us arrived at *Stockholm*, than we resolved without loss of time to set out for the bottom of the gulph of *Bothnia*, where we might judge which side of the gulph was proper for our operations, better than we could do by trusting to our charts. Nothing could retard us, neither the frightful stories they told us at *Stockholm*, nor the goodness of his *Swedish* Majesty; who, notwithstanding the orders he had given in our behalf, told us oftener than once, that it was not without a sensible concern he saw us pursue so desperate an undertaking.

We arrived at *Tornea* time enough to see the sun perform his course for several days together without setting: a sight which strikes with wonder an inhabitant of the temperate zones, even though he knows it is what must necessarily happen in that climate.

We had flattered ourselves with the hopes of performing our operations upon the coasts of the gulph of *Bothnia*, where we should have the convenience of transporting ourselves and our instruments to the different stations by sea, and where the many advantageous points of view, from the islands in all our charts, seemed to promise us success. But when we went with great impatience to view them, all our labour served only to convince us, that this design was impracticable. The islands that line the coasts of the gulph, and the coasts themselves, which we had fancied to be so many promontories, that might furnish us with distant points of view from one to another, lay
all

all of them so low upon the surface of the water, that at a small distance, the convexity of the earth must arise between them and us. So that after several small voyages in pursuance of our first design of making use of these islands, we were at last obliged to give it up.

We now resolved to endeavour to perform our operations upon the tops of the mountains to the northward of *Tornea*, though it appeared next to impossible. In the desarts of a country scarcely habitable, in that immense forest which extends from *Tornea* to cape *Nord*, we must go through operations that are not easy, even where no convenience is wanting. There were but two ways of penetrating into these desarts, both of which we must prove; one the sailing up a river full of cataracts; the other crossing thick woods and deep marshes on foot: and if we should be able to make our way into the country, we must, after the most painful marches, be obliged to clamber up steep rocks, and to clear the tops of mountains of the wood that would intercept our sight. In these desarts we should be forced to take up with the most wretched diet, be exposed to the flies, which in this season are so insufferable as to drive the *Laplanders* and their rain-deer from their habitations, to seek shelter on the coasts of the ocean. We were, in fine, to undertake this work without knowing, or being able to inform ourselves, whether it was practicable; whether the want of one mountain might not, after all our toils, interrupt the series of our triangles; or whether it would be possible to find

find upon the river a base by which they might be connected. But if we should surmount all these obstacles, we should still have the labour of building observatories on the most northerly of the mountains; the trouble of carrying thither as numerous a collection of instruments as is perhaps to be seen in *Europe*, and of making there the nicest astronomical observations: but we were so far from being deterred by these difficulties, that the prospect of conquering them filled us with pleasure.

We set out from *Tornea* on *Friday* the 6th of *July*, 1736, with a company of *Finland* soldiers, and a good number of boats laden with instruments, and provisions. We began our journey by sailing up the great river, which, rising in the inmost parts of *Lapland*, pursues its course till it falls into the gulph of *Bothnia*, having first divided itself into two branches that form the isle of *Swertzar*, where is built a town of the same name in the latitude of $65^{\circ} 51'$. From this day forward, our only habitation was the desarts, and our time was spent on the summits of those mountains which we were to connect by our triangles.

After a voyage of twelve hours, we landed in the evening at *Korpikyla*, an hamlet by the river-side inhabited by *Finlanders*; and having for some time travelled on foot across the forest, arrived at the bottom of a steep mountain called *Niwa*, whose summit, which is a bare rock, we chose for our first station. Upon the river we had been tormented by great flies with green heads, that fetched blood wherever they fixed:

but

but on the top of this mountain we were pestered with several other kinds that were still more intolerable. By good luck we found two *Lapland* girls tending a small herd of rain-deer; but almost hid in the smoak of a great fire they had kindled: and being told, on enquiry, that they thus defended themselves from the flies, we had immediately recourse to the same method.

On the eighth of *July* at one in the morning, Mr. *Camus* and I left our company upon *Niwa*, to reconnoitre the mountains to the northward. We travelled up the river to a high mountain called *Avafaxa*, where having cleared its top of the trees we caused a signal to be built. Our signals were hollow cones composed of a great many large trees, stripped of the bark, by which means they were white enough to be visible at ten or twelve leagues distance.

This being finished we came down from *Avafaxa* and embarking on the little river of *Tenglio* which falls into the great river at the foot of this mountain, we directed our course upwards to the nearest place we could find, to a mountain that seemed to suit our purpose; and from thence a march of three hours, over a morass, brought us to the foot of *Horrilakero*. Though extremely fatigued, we got to the top of it, and spent the night in cutting down the wood that covered it. Most part of this mountain is a reddish stone interspersed with a kind of white crystal. Here the flies, more merciless than those at *Niwa*, were not to be driven off by smoke, and we were obliged, notwithstanding

ing the exceffive heats, to wrap our heads in our *Cappmudes*, a fort of gown made of rain-deer skins, and to cover ourfelves with branches of fir, and even whole trees; which rather ftified than defended us from thefe troublefome insects.

Having cut down all the wood on the top of *Herrilakero*, and built a fignal, we return'd by the fame road to our boats, which we had drawn upon the bank. It is indeed no hard matter to drag along, or even to carry the boats ufed in the rivers of *Lapland*. A few thin fir boards compofe the whole veffel, which is fo extremely light and flexible, that its beating, with all the force of the fream, againft the ftones, which thefe rivers are full of, does it no manner of harm. It is terrible to thofe not accuftomed to it, and aftonifhing even to thofe who are, to fee one of thefe weak veffels drive down a cataract, in a torrent of foam and ftones, fometimes raifed aloft in the air, and the next moment loft in the deep. A bold *Finlander* fteers it with a long oar, while his two companions row hard to fave it from the purfuing waves that threaten every moment to overwhelm it. You may then fee the whole keel by turns raifed above water, and leaning only with one extremity on the top of a yeilding billow. With fuch courage and addrefs do thefe *Finlanders* pafs the cataracts; but their art and fkill in the management of their boats upon other occafions, is no lefs remarkable: a tree, branches and all, commonly ferves them both for maff and fail.

We now embarked again on the *Tenghi*, which brought us down into the river of *Tornea* on our return to *Korpikyla*. At four leagues from *Avasaxa* we left our boats, and after an hour's walk over the forest, reached the foot of *Cuitaperi*, a steep mountain; its summit is a rock covered with moss, affording an extensive prospect all round, and to the south taking in the gulph of *Bothnia*: here we erected a signal, whence we could discover all the others we had raised, and then continued our course down the river. Between *Cuitaperi* and *Korpikyla* we found some frightful cataracts, where the *Finlanders* always set their passengers ashore; but our excessive fatigue made us chuse rather to risk the passage in the boat, than to walk only an hundred yards. At last, on the evening of the 11th, we joined our friends on the top of *Niwa*, who had discried our signals, but from the continual fogs, were unable to make any observations.

The fogs being at length dispersed by the cold north wind, we had such a view of our several signals, as to take their angles; and having finished our observations there, we set up signals at *Kakama* and *Pullingi*, where having also made our observations, we all set out for *Avasaxa*.

This mountain is seated on the bank of the river, fifteen leagues from *Tornea*. Its ascent is difficult, lying through a wood that reaches half way up, where it is interrupted by steep slippery rocks, and afterwards continued to the very top of the mountain before we cut down

fo much of it as was neceffary to open our profpect. The north-eaft fide is a moft frightful rocky precipice, where the falcons build their nefts. At its foot runs the *Tenglio*, by which it is encircled. From its fummit the profpect is the moft beautiful that can be imagined; to the fouth it is unbounded, and difcovers the courfe of the river to a vaft extent: towards the eaft the *Tenglio* may be traced in its paffage through feveral lakes; and the view is terminated on the north, at twelve or fifteen leagues diftance, by a prodigious number of hills heaped one upon another. Upon this mountain we fpent ten days, during which curiofity prompted the inhabitants to pay us frequent vifits, bringing us fifh and fheep, and fuch bad fruits as are produced in the woods.

The day we left *Awafaxa*, we croffed the Polar circle, and at three the next morning, which was the 31ft of *July*, arrived at *Turtula*, a hamlet where they were cutting their little crop of barley and hay. After having travelled for fome time in the woods, we embarked on a lake that brought us to the foot of *Pullingi*, the higheft of all our mountains, and of exceeding difficult access, as well on account of its fteepnefs, as the depth of the mofs wherein we were obliged to fix our fteps: we, however, reached the top at fix in the morning. Our ftay here, which was till the 6th of *Auguft*, was no lefs difagreeable than the afcent had been painful. We had a whole wood of the largeft trees to fell, and the flies attacked us with fuch fury, that our foldiers of the regiment of

Westro-Bothnia, a body distinguished for their bravery even in *Sweden*, and hardened by the greatest fatigues, were obliged to wrap up their faces, or to smear them over with tar. These insects also poisoned our victuals; no sooner was a dish served, but it was quite covered over with them, while another swarm, with all the rapaciousness of birds of prey, was fluttering round, to carry off some pieces of a sheep that was dressing for us.

On the 6th of *August* we left this mountain to go to *Pello*, where we arrived the same day, after having forced our way up four cataracts. *Pello* is a village inhabited by a few *Finlanders*: in its neighbourhood is *Kittis*, the lowest of all our mountains, where was one of our signals. As we were going up, we discovered a copious spring of pure water, that resists the keenest frosts; for when we returned to *Pello* about the end of winter, while the sea at the bottom of the gulph, and all the rivers were frozen as hard as marble, we found this spring running as in summer. We had the good fortune to make our observations soon after our arrival, and the next day went to *Turtula*.

For a month past we had been inhabitants of the desarts, or rather of the mountain tops; the earth or rocks spread with the skins of rein-deer had been our beds; and our food was chiefly fish, brought us by the *Finlanders*, or which we ourselves had caught, and berries or wild fruit that grew in the woods.

I left *Turtula*, in company with Mess. *Outhier* and *Celsius*, to cross the forest and find the signal

signal erected at *Niemi*; and a frightful journey it was. We set out on foot, and walked till we got to a brook, where we embarked in three little boats. But they passed with such difficulty between the stones, that we were obliged every instant to get out of them and leap from one rock to another. The brook brought us to a lake so full of little yellowish grains of the bigness of millet, that the whole water was discoloured with them. I took them to be the chrysalis of some insect, and was tempted to fancy, that this insect must be some kind of those flies that so tormented us; for I could think of no other species of animals whose numbers corresponded to the quantity of grains that covered this large body of water. From the extremity of this lake we had to walk to another of very clear water. Here we found a boat, and putting our quadrant on board resolved to follow it along the side of the lake on foot: but the wood was so thick, that we were forced to cut our way through it, and were intangled at every step by the depth of the moss, and the fallen fir-trees that lay across our way.

In all these woods there are almost as many trees fallen as standing; for the soil, after it has reared them to a certain height, can no longer furnish the proper nourishment, nor is it deep enough to allow them to take firm root, whence the least blast of wind oversets them; and in all these woods nothing is to be seen but firs and birches blown down. Time reduces the wood of the latter to dust, without

affecting the bark; and one is surprized to find pretty large trees that crumble upon the slightest touch. This probably gave the *Swedes* the hint of covering their houses with this bark, and indeed nothing could be imagined fitter for the purpose. In some provinces they cover the bark with earth, and form upon the roof a kind of garden, such as are to be seen upon the houses of *Upsal*. In *Westro-Bothnia* the bark is bound with fir poles that hang down on either side of the roof.

Our woods had therefore the aspect of the ruins of woods whose trees are mostly perished; and it was through one of the most horrid of these that we now passed with twelve soldiers, who carried our baggage. Having at length reached a third lake, which was very large, and the finest water imaginable, we put our instruments and baggage on board two boats we found there, and waited their return upon the coast, when we were ferry'd over to the foot of *Niemi*.

The fine lakes that surround this mountain and the many difficulties we encountered in getting thither, gave it the air of an enchanted island in romance. On one hand you see a grove of trees rise from a plain, smooth and level as the walks of a garden, and at such easy distances, as neither to embarrass the walks, nor the prospect of the lake that washes the foot of the mountain. On the other you have apartments of different sizes that seem cut by art in the rocks, and to want only a regular roof to compleat them. The rocks themselves are so

per-

perpendicular, fo high, and fo fmooth, that you would take them for the walls of an unfinished palace, rather than for the work of nature. From this height we faw thofe vapours rife from the lake which the people of the country call *Haltios*, and deem the guardian fpirits of the mountains. We had been frightened with ftories of bears haunting this place, but faw none. Indeed it feemed rather a place of refort for fairies and genii, than for thofe favage animals.

Having compleated our obfervations, we left *Niemi*, repaffed the three lakes, and got back to *Turtula*. We afterwards departed from thence, and fet out for *Horrilakero*, entering the *Tenglio* with four boats. Its cataracts are troublefome, rather from the lownefs of the water, and the great number of ftones, than the rapidity of the ftream. As we failed along, I was furprized to fee upon the banks of this river, rofes of as lively a red, as any in our gardens. We compleated our obfervations at *Horrilakero* on the 17th of *Auguft*, and the next day went to *Ofwer-Tornea*, where our whole company was now afsembled.

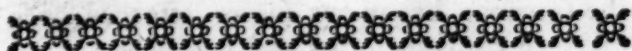
But afterwards going up to *Avasaxa* to take the angles that muft connect the bafe, which we had fixed on the bank of the river with our triangles, we faw *Horrilakero* all in flames. This is an accident not uncommon in thefe woods, where there is no living during the fummer, without fmoke, and where the mofs and firs are fo combuftible, that a fire once kindled will fpread over fome thoufand acres; and the
smoke

smoke of these fires have sometimes retarded our observations as much as the thickness of the air. As this fire on *Horrilakero* had been doubtless occasioned by our not taking sufficient care to extinguish those we had kindled there, we dispatched 30 men to cut off its communication with the neighbouring woods: but three days after, when he had finished our observations at *Avafaxa*, *Horrilakero* was still burning; we saw it involved in a cloud of smoke, and the flames, which had made their way downwards were ravaging all the forest below.

By the 9th of September, when we had passed 63 days in these deserts, we had finished as complete a set of triangles as we could have wished for; and an undertaking begun in a manner at random, without knowing whether it was at all practicable, had turned out so much better than expectation, that it looked as if the placing of these mountains had been at our disposal. We had built two observatories upon *Kittis*, in the one was a quadrant of two foot radius, a clock of Mr. *Graham's*, and an instrument which we owed to the same gentleman, consisting of a telescope, moveable about an horizontal axis, which was to determine the direction of our triangles with respect to the meridian. The other observatory, which was much larger, was built so near the first, that the voice of him who counted the pendulum's vibrations, could be distinctly heard from one to the other. An admirable sector also made by Mr. *Graham* took up almost the whole room.

What

What difficulty we had in carrying up so many instruments to the top of the mountain, I shall not mention; it is sufficient that we carried them up.



CHAP. II.

The dreadful Hardships they suffered from the Severity of the Weather. The amazing Sharpness of the Cold; and the Beauty of the Northern Lights in a Lapland Winter.

WE had some ice on the 19th of *September*, and snow on the 21st; some parts of the river were also frozen. On the first of *November* it began to freeze harder, and on the morrow the river was quite frozen up. The ice, which thawed no more, was presently covered over with snow; and this vast body of water, but a few days before full of swans and other waterfowl, was now one immense plain of ice and snow. Our work was now in a manner compleated, we had only to measure our base, which was no more than surveying the distance between the two signals we had erected last summer; but this was to be done upon the ice of a river in *Lapland*, at the distance of above three leagues, in a country where the cold was growing every day more intense. On the 21st of *December* this work was begun. In this season the sun but just shewed itself above the horizon towards noon; but the

the long twilights, the whiteness of the snow, and the meteors continually blazing in the sky, furnished us light enough to work four or five hours every day. We lodged at the house of the Curate of *Osfer-Tornea*, and at eleven in the forenoon began our survey, attended by so great an equipage, that the *Laplanders*, drawn by the novelty of the sight, came down from the neighbouring mountains. We separated into two bands, each of which carried four rods of fir, each 30 feet long. I shall say nothing of the fatigues and dangers of this operation. Judge what it must be to walk in snow two feet deep, with heavy poles in our hands, which we were obliged to be continually laying on the snow, and lifting again; in a cold so extreme, that whenever we would taste a little brandy, the only thing that could be kept liquid, our tongues and lips froze to the cup, and came away bloody: in a cold that congealed the fingers of some of us, and threatened us with still more dismal accidents. While the extremities of our bodies were thus freezing, the rest, through excessive toil, was bathed in sweat. Brandy did not quench our thirst; we must have recourse to deep wells dug through the ice, which were shut almost as soon as opened, and from which the water could scarcely be conveyed unfrozen to our lips; thus were we forced to run the hazard of the dangerous contrast which ice-water might produce in our heated bodies.

Our work, however, advanced apace; for six days labour brought it to within about 500 toises,

toises, where we had not been able to plant our stakes soon enough: three of the gentlemen therefore undertook this office, while the the Abbé *Outhier* and I went upon a pretty extraordinary adventure. We had last summer omitted an observation of small moment: this was taking the height of an object that we made use of in measuring on the top of *Avasaxa*; and to perform this, I undertook to go with a quadrant to the top of the mountain, so scrupulously careful were we that nothing should be wanting to the perfection of the work. Imagine a very high mountain full of rocks, that lie hid in a prodigious quantity of snow, as well as their cavities, wherein you may sink through a crust of snow as into an abyss, and the undertaking will scarce appear possible. Yet there are two ways of performing it; one by walking, or rather sliding along upon two strait boards eight feet in length, which the *Finlanders* and *Laplanners* use to keep them from sinking into the snow: but this way of walking requires long practice. The other is by trusting yourself to a rein-deer used to such journeys.

The machine drawn by these animals is here a kind of boat scarce large enough to hold the half of one's body. As this travelling in the snow is a kind of navigation, that the vessel may suffer the less resistance in its course, it has a sharp head, and a narrow keel, like an ordinary boat; and on this keel it tumbles so from side to side, that if a man does not take good care to balance himself, it will be every moment

moment in danger of oversetting. It is fixed by thongs to the collar of the rain-deer, who, as soon as he finds himself on a firm beaten road, runs with incredible fury. If you would stop him, it is to little purpose to pull a sort of rein that is tied to his horns: wild and unmanageable, it will only make him change his track, or perhaps turn upon you, and revenge himself by kicking. If this happens to a *Laplander*, he turns the boat over him, and uses it as a buckler against the attacks of the rain-deer: but as we were strangers to this address, we might have been killed before we could put ourselves in such a posture of defence. We had nothing to defend us with but a little stick each of us held in his hand, by way of rudder to steer our course, and keep clear of the trunks of trees. In this manner was I to climb *Avafaxa*, accompanied by the Abbé Outhier, but we were attended by two men and a woman of the country, and Mr. *Brunnius* their Curate.

The first part of our journey was performed in a moment; for our flight over the plain beaten road from the curate's house to the foot of the mountain can be compared only to that of birds. And though the mountain where there was no track greatly abated the speed of our rain-deer, they got at length to the top of it; where we immediately made the observation for which we came. In the mean while our rain-deer had dug deep holes in the snow, where they browsed on the moss that covers the rocks; and the *Laplanders* had lighted a
great

great fire, and we presently joined them to warm ourselves. The cold was so extreme, that the heat of the fire could reach only to a very small distance. As the snow just by it melted, it was immediately froze again, forming a hearth of ice all round.

Our journey up hill had been painful; but now our concern was lest our return should be too rapid. We were to proceed down the steep in conveyances, which, though partly sunk in the snow, slid on notwithstanding, drawn by animals, whose fury in the plain we had already tried, and who, tho' sinking to their bellies in the snow, would endeavour to free themselves by the swiftness of their flight. We very soon found ourselves at the bottom of the hill; a moment after this great river was crossed, and we were returned back to the curate's house.

The next day we finished our survey, and made all possible haste back to *Tornea* to secure ourselves in the best mannner we were able from the increasing severity of the season. The town of *Tornea*, at our arrival on the 30th of *December*, had really a most frightful aspect, Its little houses were buried to the tops in snow, which, had there been any day light, must have effectually shut it out. But the snow continually falling, or ready to fall, for the most part hid the sun the few moments he might have appeared at mid-day. In the month of *January* the cold was increased to that extremity, that Mr. *Reaumur's* mercurial thermometers, which at *Paris*, in the great frost of 1709, it was thought strange to see fall to 14.

degrees below the freezing point, were now got down to 37. The spirit of wine in the others was frozen. If we opened the door of a warm room, the external air instantly converted all the vapour in it into snow; whirling it round in white vortexes. If we went abroad, we felt as if the air was tearing our breasts in pieces; and the cracking of the wood of which the houses are built, as it split by the violence of the frost, continually alarmed us with an encrease of cold. The solitude of the streets was as great as if the people had been all dead: and in this country you may often see people who have lost an arm or leg by the frost. The cold, which is always very great, sometimes increases by such violent and sudden fits, as are almost infallibly fatal to those who are so unhappy as to be exposed to it; and sometimes there rise sudden tempests of snow that are still more dangerous. The winds seem to blow from all quarters at once, and drive about the snow with such fury, that all the roads are in a moment rendered invisible. Dreadful is the situation of a person surprized in the fields by such a storm: his knowledge of the country, and even the mark, he may have taken by the trees cannot avail him: he is blinded by the snow, and if he attempts to find his way home is generally lost. In short, during the whole winter the cold was so excessive, that on the 7th of *April*, at five in the morning, the thermomiter was fallen to 20 divisions below the point of freezing, though every afternoon it rose two or three divisions above

above it: a difference in the height not much less than that which the greatest heat and cold felt at *Paris* usually produce in that instrument. Thus in the space of 24 hours, we had all the variety felt in the temperate zones in the compass of a whole year.

But tho' in this climate the earth is thus horrible, the heavens present the most beautiful prospects. The short days are no sooner closed, than fires of a thousand colours and figures light up the sky, as if designed to compensate for the absence of the sun in this season. These fires have not here, as in the more southerly climates, any constant situation. Though a luminous arch is often seen fixed towards the north, they seem more frequently to possess the whole extent of the hemisphere. Sometimes they begin in the form of a great scarf of bright light, with its extremities upon the horizon, which, with a motion resembling that of a fishing-net, glides swiftly up the sky; preserving in this motion a direction nearly perpendicular to the meridian; and most commonly after those preludes, all the lights unite at the zenith, and form the top of a kind of crown. Arcs like those seen in *France* towards the north, are here frequently situated towards the south; and often towards both the north and south at once. Their summits approach each other, the distance of their extremities widens towards the horizon. I have seen some of the opposite arcs whose summits almost joined at the zenith; and both the one and the other have frequently several concentric

arcs beyond it. Their tops are all placed in the direction of the meridian, though with a little declination to the west; which I did not find to be constant, and which is sometimes insensible. It would be endless to mention all the different figures these meteors assume, and the various motions with which they are agitated. Their motion is most commonly like that of a pair of colours waved in the air, and the different tints of their light gives them the appearance of so many vast streamers of changeable taffeta. Sometimes they line a part of the sky with scarlet. On the 18th of *December* I saw a phenomenon of this kind, that in the midst of all the wonders to which I was now every day accustomed, raised my admiration. To the south a great space of the sky appeared tinged with so lively a red, that the whole constellation of *Orion* looked as if it had been dipped in blood. This light, which was at first fixed, soon moved, and changing into other colours, violet and blue, settled into a dome, whose top stood a little to the south-west of the zenith. The moon shone bright, but did not in the least efface it. In this country, where there are lights of so many different colours, I never saw but two that were red; and such are taken for presages of some great misfortune. After all, when people gaze at these phænomena with an unphilosophic eye, it is not surprizing if they discover in them armies engaged, fiery chariots, and a thousand other prodigies.

During

During the winter we repeated many of our observations and calculations, and found the most evident proofs of the earth's being considerably flattened at the poles. Mean time the sun came nearer, or rather no more quitted us. It was now *May*, when it was curious enough to see that great luminary enlighten for so long a time a whole horizon of ice, and to see summer in the heavens, while winter still kept possession of the earth. We were in the morning of that long day of several months; yet the sun with all his power wrought no change either upon the ice or snows.

On the 6th of *May* it began to rain, and some water appeared on the ice of the river. At noon a little snow melted; but in the evening, winter resumed his rights. At length, on the 10th, the earth which had been so long hid began to appear; some high points that were exposed to the sun shewed themselves, as the tops of the mountains did after the deluge, and all the fowls of the country returned. At the beginning of *June*, winter yielding up the earth and sea, we prepared for our departure back to *Stockholm*, and on the 9th some of us set out by land and others by sea. But the sequel of our adventures, and our shipwreck in the gulph of *Bothnia*, says our author, belong not to the present subject.

